Arms Control & Disarmament

A QUARTERLY BIBLIOGRAPHY WITH ABSTRACTS AND ANNOTATIONS

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PREFACE

Arms Control & Disarmament attempts to bring under bibliographic control a large and growing body of literature in an important subject area. It is prepared by the Arms Control and Disarmament Bibliography Section of the Library of Congress, through the support of the U.S. Arms Control and Disarmament Agency.

Each quarterly issue contains abstracts and annotations of current literature in the English, French, German, and Russian languages, as well as abstracts and annotations of current literature in all languages published in English translation. Author and subject indexes appear in the first three numbers of each volume, with the fourth number containing cumulative author and subject indexes.

To facilitate the use of this bibliography the title of each foreign language entry is preceded by its English translation in brackets. Titles in the Cyrillic alphabet are transliterated according to the Library of Congress system, but with ligatures omitted. For the convenience of readers in the Library of Congress, call numbers are given for all cataloged and classified materials. Uncataloged and unclassified materials are designated by symbols indicating the custodial divisions of the Library in which they can be found. A list of these symbols appears on the next page.

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The bibliography is compiled from a survey of the literature received by the Library of Congress that is likely to be available in the larger research and public libraries in the United States. Sources surveyed include trade books, monographs, selected government publications, publications of national and international organizations and societies, and approximately 1,700 periodicals. With the exception of materials delayed in arriving at the Library, the literature cited has usually been published in the 3 months preceding the month in which a number is sent to press. Entries are chosen under the assumption that arms control and disarmament is a subject area encompassing related topics such as weapons development and basic factors in world politics. The coverage is not exhaustive, however. It excludes articles in newspapers and the reporting of day-to-day events in newsmagazines.

The abstracts are written by the Arms Control and Disarmament Bibliography Section, except that abstracts or summaries published with the articles to which they relate may be used verbatim or in a modified form; they are designated "author's abstract," "author's summary," etc.

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Sci RR	Science Reading Room
Slav Rm	Slavic Room

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I. THE INTERNATIONAL POLITICAL ENVIRONMENT

A. BASIC FACTORS IN WORLD POLITICS

1233
[ALLIANCES IN CRISIS] Allianzen in der Krise [by pc] Moderne Welt, v. 8, no. 1, 1967: 3-8.
D839. M58, v. 8

The last few years' loosening in the Western and Soviet alliances by no means signifies their end, but merely difficulty in adjusting themselves to new developments in a basically unchanged international situation. The world balance of power still rests on two superpowers "ideologically alienated from each other." Precisely because of the heterogeneity of the present bipolar system no member of either alliance can make a complete about-face of its principal allegiance. This stands in striking contrast to the classical balance-of-power pattern of the 19th century and the first decades of the 20th: "a Europe-centered concert" of several powers, equal in strength and similar in their world outlook. As for contemporary alliances between the Third-World nations they are obviously inconsequential to the world balance of power. Hegemony of the superpowers in their principal alliances and the absence of a third superpower in the world influence both intra- and interbloc relations in many ways. Individual foreign policies of allies are, if not directly subservient to that of "the central power," at least subjected to requisite consultation. "Cross connections" between the second-ranking powers of different blocs are as a rule nonautonomous in purpose; they represent either an instrument of the central power's foreign policy or a lever for a smaller nation to gain greater independence. Despite ideological differences between both superpowers their interests in warding off mutual annihilation, securing peace, and preventing war run parallel. Still a reversal of alliances, with Washington and Moscow cooperating against Peking, or Washington and Peking cooperating against Moscow, is as unlikely as the restoration of the "Sino-Soviet antiimperialist brotherhood." The Red Chinese schism has its own logic, manifesting the deep division between the haves and the have-nots.

1234
Arian, Alan. THE ROLE OF IDEOLOGY IN DETERMINING BEHAVIOUR. Sociological review, new ser., v. 15, Mar. 1967: 47-57.
HM1. S7, n. s., v. 15

Presents the results of an empirical study of the interrelationships between behavior, ideas, and reality. The study itself centered on the ideology of the Israeli kibbutz and uncovered the fact that ideology, through its influence on perception, strongly affects behavior.

1235
Hanning, Hugh. INSURGENCY AND WORLD ORDER. Disarmament, no. 13, Mar. 1967: 5-8.
JX1981. P7D5, 1967

Prevention of insurgency is difficult because it is often backed by one of the great powers whose cooperation is needed to check it. None of the major powers can oppose insurgency in general since they themselves are products of a revolution of some sort, but they do differ concerning the desirability of different types of change. Recently Russia and the West have begun to see eye-to-eye on certain issues, particularly on the need to restrict violence in the developing world. One of the best means to achieve this is through regulation of both the open and clandestine flow of conventional arms. Russia may agree to this measure for several reasons. History shows that weapons strengthen the political hand of the armed forces, making a military coup (generally regarded as a setback for communism) more likely. And once sold, a weapon can be turned against the seller, or can be resold with highly undesirable consequences. Both the American and Soviet governments have found arms sales counterproductive in certain instances. The best way for both nations to avoid "the appalling entanglements of a confrontation in some far-off land, where practically the only advantage to be gained is the assurance that the other fellow is not getting the advantage," may be establishment of a Peace Observation Group to check whether an insurgency is purely domestic or externally fomented. At the same time a means to facilitate non-violent change, such as a referendum or plebiscite under United Nations machinery, should be established. Governments will not always welcome such actions, nor can the United Nations be expected to intervene to support such claims as moves for secession, but even so there may be many occasions when a sovereign government will be glad to invoke the U. N. machinery. What are now needed are "reliable and respected techniques for canalizing the will of minorities by resort to international arbitration." Only then will governments take heed of the economic and social needs of their minorities--problems at the foundation of insurgency.

1236
Kahn, Herman. UNCERTAIN ROAD TO THE 21ST CENTURY. Think, v. 33, Jan./Feb. 1967: 2-12. illus.
HF5001. T5, v. 33

The world of tomorrow is unlikely to be very different from the one of today due to a number of factors. The world is entering a period of relative balance as far as wars that threaten the homelands of the developed nations are concerned. As nations realize that internal economic development is the key to wealth and power, fewer pressures toward territorial expansion arise. Many "pluralistic security communities" on the U. S. -Canadian model are developing in which war or violence is unthinkable. While military capabilities will remain important internationally, the use of military power is likely to grow more sophisticated and subtle. In the next century there will probably be 10 major powers, with the U. S. and the Soviet Union still the superpowers. Communist China will remain rather weak in offensive force, although its defenses will continue to grow. Its economy will grow substantially, but many of its gains will be canceled by population increases. Japan will continue to overshadow China

technologically, and its economic growth rate will make it the major power in Asia. The Soviet Union will continue to improve its relations with Europe and the United States, but any firm alliance is unlikely. Germany will remain divided, and East Germany will become an increasingly viable state. Much of the force of the Afro-Asian revolution will subside, and its leaders will turn toward socialism rather than communism. Some of the more advanced Latin American states will attain sufficient national self-confidence to abandon anti-Americanism in favor of a relationship of mutual respect and empathy. Economic growth and improved living standards can be expected, but political unrest in the area will remain. Japan is likely to be the next nuclear power, followed eventually by West Germany and Italy. While Israel and India are unlikely to procure nuclear weapons due to U.S. threats to withdraw its support if they do, many other nations will follow Japan and West Germany. Nevertheless the last third of the 20th century should bring unsurpassed prosperity and relative stability to the developed nations of the world.

1237
Long, Franklin A. SCIENTISTS IN WORLD AFFAIRS: WHERE DO WE GO NOW? Bulletin of the atomic scientists, v. 23, Mar. 1967: 14-18.
TK9145. A84, v. 23

Reviews the contributions which scientists have made to economic development, foreign policy, defense, and arms control and disarmament. Long also suggests a number of areas in which the technical knowledge of able scientists and engineers can make a significant contribution--civil defense, chemical and biological warfare, and even international discussions. He calls for more cooperation between scientists and scholars in other fields, giving as an example the summer studies sponsored by the Arms Control and Disarmament Agency.

1238
Martin, Kingsley. IS WORLD WAR INEVITABLE? New statesman, v. 74, July 14, 1967: 45.
AP4. N64, v. 74

The initial phase of world war III has begun. World cynicism, the arms race, threats of war, and limited wars have engendered an international situation analogous to those years preceding World War II. Acts like the destruction of Guernica and the massacre of innocent civilians during the Spanish Civil War are met with once more in the bombing of North Vietnamese villages and killing of civilians. The Middle East is again the scene of aggression. The Arab nations and their leaders have refused to accept defeat, recognize the existence of Israel, or negotiate international agreements relating to boundaries, waterways, and rights of passage. The "psychological climate" is ripe for war. However world war III will not necessarily annihilate all life on earth. The alternative, a "balance of fear" --diplomacy predicated on a human preference to die rather than yield when defeated in combat--may result in ritualized aggression, with mutual defamation substituted for war. At best this is a precarious game, allowing limited wars to continue all over the world--a game in which man alone must decide whether he will live or die.

1239
Miksche, Ferdinand O. [A BLITZKRIEG--AND WHAT NEXT?] Ein Blitzkrieg -- und was nun? Wehr und Wirtschaft, v. 11, July 10, 1967: 400-402. map.
U3. W38, v. 11

Anybody who may have been led so far astray by recent détente policies as to believe that conflicts between the Great Powers are impossible in the age of the "nuclear balance" will have been jolted out of his dreams by the crisis in the Middle East. Once again the tragic events of the past few weeks have shown how shaky are the foundations on which the peace of the world rests. Despite all talk about nuclear deterrence, détente movements and "loosening up in the Eastern bloc", the Cold War between East and West goes on, and it is doubtful whether, in fact, it has ever ceased. Once more it has been shown that Russia is still a great enigma for the West and that many surprises are possible. (Abstract supplied)

1240
Morgenthau, Hans J. ARGUING ABOUT THE COLD WAR. Encounter, v. 28, May 1967: 37-41.
AP4. E44, v. 28

Two factors distinguish the cold war from other hostile confrontations in history: the impossibility of compromise, given the interests at stake and the positions taken, and the necessity of using all means short of force to pursue and promote those interests. Participants are not concerned with reciprocal accommodations but with unilateral concessions from the other side. The cold war came to a head in the postwar controversy over Soviet and U.S. spheres of influence in Eastern Europe. Stalin interpreted the West's insistence on Western democracy in the nations as hostile to Russian interests, while the West saw transformation of the nations into Soviet satellites as proof of the unlimited ambitions of Soviet communism. Western "misinterpretation" of North Korean aggression as the beginning of Russia's plan for world conquest resulted in drastic militarization of the cold war through the arms race and the establishment of alliances and military bases. Khrushchev introduced new methods of waging the cold war, including military intervention and threats, diplomatic pressure, foreign aid and trade, support of subversion, and exploitation of Soviet technological prestige. The post-Khrushchev cold war era is characterized by the revival of national power and by new alinements and configurations in place of the two superpower-led blocs. Many interpret the return to near-normalcy of Soviet-U.S. relations in Europe as proof that the cold war is about to end. However, the arms race continues, military bases remain, Soviet-U.S. confrontation persists in many parts of the world, and the German problem remains unsolved. Thus even if the cold war ends, problems far more risky and complex will remain.

1241
National Inter-Religious Conference on Peace, Washington, D.C., 1966. RELIGION AND PEACE: PAPERS FROM THE NATIONAL INTER-RELIGIOUS CONFERENCE ON PEACE. Edited by Homer A. Jack. New York, Bobbs-Merrill [1966] 137 p.
JX1963. N24, 1966aa

Partial contents. --The issue of peace; the voice of religion, by John C. Bennett. --The role of arms in

the search for peace, by Arthur W. Barber. --Peace is more than a word, by Hubert H. Humphrey. --The will for peace, by John J. Wright. --The limitations and possibilities for peace, by Salvatore Adamo, Arthur Moore, and Steven S. Schwarzschild.

Papers of a conference that dealt with such crucial contemporary issues as communism, China, intervention, and Vietnam. In his address to the Conference, Dr. Bennett urged churches and synagogues to provide a spiritual environment within which the vital moral issues of international politics and national survival can be continually reexamined. Arthur Barber, Deputy Assistant Secretary of Defense for International Security Affairs, related the Vietnam War to the age-old problem of aggression. He also examined the problem of nuclear nonproliferation. Vice President Humphrey spoke on his conception of "peace." Bishop Wright discussed Pope Paul's efforts towards peace. Under the general rubric "The Limitations and Possibilities of Organized Religion Acting for Peace," Msgr. Adamo, Arthur Moore, and Rabbi Schwarzschild, three leading religious journalists, told of their religions' efforts toward peace.

1242
Pool, Ithiel de Sola. THE INTERNATIONAL SYSTEM IN THE NEXT HALF CENTURY. Daedalus, v. 96, summer 1967: 930-935. Q11.B7, v. 96

The following predictions are made, not in arrogant confidence, but in an attempt to anticipate with some specificity the events of the next 50 years. No nuclear war will occur in this period. De Gaulle will die, and presidential power will atrophy in France, giving way to coalition governments committed to European unity but noncooperation with NATO. Fighting in Vietnam will wane about 1967 after a substantial American victory, but sporadic terrorism and economic instability will remain. In the United States Lyndon Johnson will be reelected in 1968, and continued economic growth will create inflationary pressures and labor shortage. In Latin America the gap between the rich countries and the poor will grow. In Africa general chaos will prevail, resulting in the late 1970's in major war and massive U.N. military intervention. Mao Tse-tung's death will have little effect on Chinese policies. However, protracted famine in the 1980's will lead to guerrilla warfare, and eventually to a moderate regime that, while nominally Communist, will reestablish China's foreign contacts. Discontent with the functioning of the Soviet economic system will increase, culminating about 1980 in large-scale strikes and dissent, but stopping short of revolution. The Soviet hold on Eastern Europe will break completely and the Communist Party will disintegrate into several factions in most nations. German unification will not occur. European nations will not be abolished, but will enter a loose confederation including most of the present countries from England to Rumania. Token nuclear proliferation will take place in several nations including India, Pakistan, Egypt, Israel, Germany, Japan, and Algeria. Of more importance will be the emergence around 1990 of a new type of weapon even more dangerous than nuclear weapons. Nonetheless the amount of violence in the world will begin to decline about 1990 with the modification of the nation-state system and the strengthening of the United Nations. After the year 2000, developed areas will assume increasing responsibility in helping the rest of the world achieve higher standards of living.

1243
Riklin, A. [WAR AND PEACE AS BONES OF CONTENTION IN WORLD COMMUNISM TODAY] Krieg und Frieden als Streitobjekte im Weltkommunismus der Gegenwart. Allgemeine schweizerische Militärzeitschrift, v. 133, Feb. 1967: 61-65.
U3.A43, v. 133

Relates the viewpoints of Moscow, Peking, and Belgrade on Communist world revolution. According to Moscow this should be achieved through peaceful coexistence, according to Peking through armed struggles, and according to Belgrade through "evolution."

1244
Robinson, Thomas W. A NATIONAL INTEREST ANALYSIS OF SINO-SOVIET RELATIONS. [Santa Monica, Calif., Rand Corp.] 1966. 67 p. ([Rand Corporation. Paper] P-3319) AS36.R28, no. 3371

Applies Hans Morgenthau's theory of national interest to an analysis of Sino-Soviet relations. Robinson divides his study into four parts: a discussion of the national interests of the Soviet Union and China during the post-1949 period to determine whether they vary concomitantly with changes in Sino-Soviet relations; an investigation of the applicability of Morgenthau's hypothesis about the relation between power and interest to Sino-Soviet relations; an analysis of the Sino-Soviet alliance in terms of the two countries' respective interests; and an assessment of the influence of nuclear weapons on their national interests. In a lengthy appendix Robinson gives his interpretation of Morgenthau's theory of national interest.

1245
Spannocchi, Emil. [A PLACE FOR THE SMALL NEUTRAL STATE IN THE NUCLEAR AGE. AN AUSTRIAN VIEW] Standortbestimmung für den neutralen Kleinstaat im Atomzeitalter aus österreichischer Sicht. Allgemeine schweizerische Militärzeitschrift, v. 133, July 1967: 407-414.
U3.A43, v. 133

Reflections on the sovereignty and security of small nations. Spannocchi thinks that such a state enjoys only limited sovereignty, but that modern strategic-political realities provide a margin for the effective use of conventional military power to protect its independence. These realities create a war image that is technically correct but politically absurd (nuclear war); limit the political rationality of "unlimited nuclear war" to relations between superpowers; and make Europe "a place of decision" for the "hegemony states"--decisions utilizing military means but non-nuclear nevertheless, because nuclear war and political decisions are mutually exclusive. The author discusses at length the implications of American and Soviet strategies for Europe and their impact on Austria's security.

1246
Steel, Ronald. BEYOND THE POWER BLOCS. Dissent, v. 14, May/June 1967: 345-357.
HX1.D58, v. 14

The cold war struggle between the Soviet Union and the United States is no longer so much a struggle for world supremacy as "a kind of military gymnastics

with vague moral overtones." Even Europe, once the center of cold war conflict, has become a "haven of stability." Neutral nations have found their loyalty is no longer solicited by the superpowers, who now regard military and economic assistance as more of a chore than an opportunity. The cold war that once divided the world into two rival blocs can never be resumed in its old form. For one thing, the Soviet bloc has disintegrated and Peking has openly rebelled. Communism has dramatically failed to provide a substitute for nationalism in Europe. At the same time the Atlantic alliance has also dissolved, as the Russian threat that formed the basis for its unity waned. Extraordinary economic prosperity in Western Europe has reinforced this trend, and has caused the Europeans to chafe under American hegemony. Meanwhile scores of underdeveloped nations are demanding political equality and economic progress, and are interested in political ideology only to the extent that it can serve these goals. The diminishing significance of nuclear weapons as a diplomatic tool has also contributed to change in the cold-war world. The bomb has served as a deterrent to war but has not helped to resolve political differences. Tacit cooperation now exists between the Soviet Union and the United States, as both attempt to avoid being drawn into a nuclear war against their will through the actions of a third party. The disintegration of the power blocs has not brought peace as liberals and radicals once imagined it would, but has instead brought fluidity and instability to world affairs as conflict shifts to disputes between rising states and established ones. Beyond the cold war is a world in which neither the Soviet Union nor the United States can hope to assert its will except in its own vital concerns; both nations must recognize the limitations on their influence and actions.

1247
Stoel, M. van der. FOUR PROBLEMS FOR THE ALLIANCE: OR THE DANGER OF DRIFTING APART. Common market, v. 7, May 1967: 116-119.
P&GP RR

Considers problems having a "divisive effect on relations between America and Europe," such as precocious aspirations for an European nuclear force, suspicions of Soviet-American "atomic complicity," the implications of East-West détente efforts for the German question, and the technological gap between the United States and Europe. These can best be solved, Stoel suggests, by strengthening international institutions, particularly NATO, the Organization for Economic Cooperation and Development, and the European Economic Communities.

1248
WHEN THE WORLD LOOKS AT U.S.--A STUDY IN POWER. U.S. news & world report, v. 63, July 24, 1967: 24-26. illus. JK1.U65, v. 63

A "Pictogram" comparing American power with that of the rest of the world. The diagrams demonstrate that the United States produces nearly half of the world's yearly industrial output. Eleven American states produce as much as the entire Soviet Union; California outproduces Communist China; Illinois produces almost as much as all Africa; and New York, Connecticut, and Rhode Island produce more than France. America is without rival in the world, the text asserts, which perhaps explains world anti-Americanism.

B. FOREIGN POLICIES

1249
Alphand, Hervé. [FRANCE'S FOREIGN POLICY IN 1967] La politique extérieure de la France en 1967. Revue de defénse nationale, v. 23, June 1967: 943-951. D410.R45, v. 23

The fact of two World Wars, a belief in the right of self-determination, and a realistic acknowledgment of a rapidly changing world determine the direction and implementation of France's foreign policy. It is designed primarily to promote European peace and security, through resolution of the German reunification problem and by adjusting France's actions to vicissitudes within the international community--especially in the Communist world. France's increasing diplomatic intercourse with the Communist world is indicative of its belief that without Communist cooperation European security will be impossible. It seeks the resolution of the German problem by a total integration of Europe's economy. In two cases France's policy has caused her to act independently of the United States, her longtime Atlantic partner. France's withdrawal from NATO was justified by political realities: the irreconcilable facts of French occupation troops on German soil and an emerging rapprochement with West Germany. And its opposition to the war in Vietnam is based not only on the principle of self-determination, but on the fear that further prolongation of this war will engender a major confrontation between the two great powers and destroy all chances for a peaceful settlement in Southeast Asia.

1250
Arora, S. K., L. C. Kumar, and Dalip Singh. INDIA AND WORLD AFFAIRS: AN ANNUAL BIBLIOGRAPHY, 1965. International studies, v. 8, Jan. 1967: 311-360. JX18.155, v. 8

Bibliography in two parts, the first listing books, articles, and documents on India's foreign relations, and the second concerned with expressions of Indian opinion on world affairs. References on disarmament and India's nuclear weapons policy appear in both sections.

1251
Birrenbach, Kurt. [TOPICAL QUESTIONS OF THE GERMAN POLICY] Aktuelle Fragen der Deutschland-Politik. Europa-Archiv, v. 22, Apr. 25, 1967: 267-278. D839.E86, v. 22

East Germany is of the utmost importance to Soviet control over East Europe and particularly Poland. It is the biggest supplier of investment goods within the bloc, and it enables Moscow to stretch militarily into the center of Europe. The incorporation of East Germany in the German Federal Republic would, in the Soviet view, upset the existing balance of power to the detriment of Soviet interests. If it happened through popular suffrage it would certainly "discredit the legitimacy of all other People's Democracies in East Europe." In such a situation Bonn's policy should aim at: preserving "the German nation's substance" in both Germanies; rallying the West for the cause of German reunification; conducting policy toward East Europe conducive to reunification; and trying to "win the Soviet Union" for this cause.

1252
Brezhnev, Leonid I. THE SOVIET VIEW OF NATO. Vital speeches of the day, v. 33, June 15, 1967: 514-522. PN6121.V52, v. 33
"Delivered before the Conference of Communist and Workers Parties of Europe, Karlovy Vary, April 24, 1967."

The problems of European security are inseparably linked to the general world struggle for peace and social progress and against imperialism. The greatest threat to Europe today is the aggressive force of American and West German imperialism. German militarism and nazism still live in the Federal Republic, which has created one of the largest armies in Europe. Until recently NATO was the basic instrument for U.S. policy in Europe, but its members are now beginning to question the price of participation in this bloc. American cultural and scientific domination are becoming intolerable to all who cherish national dignity. To encourage all-European cooperation the Warsaw Pact nations have proposed a conference of East and West Europeans to discuss security problems. Among the central issues are the inviolability of the national frontiers established by World War II, recognition of two German states with different social systems, and prevention of the further proliferation of nuclear weapons. The Warsaw Pact nations have agreed to disband in favor of an all-European security system if the NATO governments will do the same. The Soviet Union seeks peaceful coexistence and cooperation with the capitalist nations of Europe. The interests of the working classes in East and West are identical; these peaceloving forces must join one another on the road to peace and socialism.

1253
Brzezinski, Zbigniew. COMMUNISM IS DEAD. New leader, v. 50, July 17, 1967: 10-13. HX1.N37, v. 50

Five major world changes are occurring that will profoundly alter international relations. First, ideological conflicts among developed nations are waning. Recognition of the destructiveness of nuclear weapons has moderated even the most bitter ideological hatreds, as has the realization that social change is too complex to reduce to simple formulas. One such panacea, communism, "is dead . . . in the sense that it is no longer capable of mobilizing unified global support." Second, violence has declined among the advanced nations, in large part due to fear of modern weaponry, and instability among the less developed nations has become the major source of global tension. Third, the supremacy of the nation-state is declining, as people increasingly identify themselves with continents and regions or even wider, global human interests. Fourth, the United States has emerged as the preponderant world power in all areas, culturally and technologically as well as militarily. And fifth, differences between the United States and the rest of the advanced world are growing, as the former becomes a postindustrial society and the latter are still being shaped by the industrial process. The United States, which has always been relatively free of ideological shackles, must avoid the foreign policy prescriptions of extremists on both the left and right, recognizing that American involvement is a major stabilizing factor in the world and that withdrawal would create international chaos. The Nation must avoid involvement in conflicts that pit it against revolutionary nationalism, but must intervene where its absence creates regional instability. In dealing with developed nations, particularly in Western Europe, the United States should stress technological skills and broader social involvement instead of political and security arrangements. The United States must build a community of developed nations, including all of Europe and the Soviet Union, as the only possible means toward world stability.

1254
Farer, Tom J. THE ENEMY: EXPLORING THE SOURCES OF A FOREIGN POLICY. Columbia University forum, v. 10, spring 1967: 13-17. AS30.C59, v. 10

The "enemy" are men in underdeveloped nations who espouse radical (i.e. leftist) social change, oppose the intransigent elite, and are emotionally and strategically committed to engaging the masses in a social and political transformation. Their preference for authoritarianism and their intense nationalism strongly resembles their rightist counterparts', but their attitude toward the populace differs sharply. Administration spokesmen claim that the United States finds these revolutionaries intolerable because "they are violent," and imply that violence plants the seeds of world war III and upsets the stability required for economic development. They overlook the fact that in some nations social revolution is a prerequisite to development, and that sacrifice toward economic development often requires an authoritarian regime accepted by the masses. Any U.S. President seeking reelection tries to define foreign policy issues in politically acceptable terms. President Kennedy understood that the internal and external dialogue are inseparable in international relations, and he tried to change the entire tone of the U.S. policy toward communism. Since his death the United States has returned to "the rhetoric of Armageddon," a position difficult to reconcile internationally with its purported efforts toward détente. Somehow the radical left presents a cultural challenge to the American electorate. This challenge is reinforced by a Calvinistic sense of mission, the Southern attitude toward the colored populations of the underdeveloped nations, and an attitude of uncritical antagonism toward the enemy that the military establishment has trained Americans to fight. Administration critics maintain that accession of left-wing regimes to power needn't adversely affect their relations with the United States, particularly if the United States tolerates or even encourages their emergence. The United States must cease its efforts to vindicate its own social and political priorities through "the undiscriminating suppression of alternative cultural enterprises."

1255
Freidin, Seymour. WHATEVER HAPPENED TO EUROPE? Saturday review, v. 50, May 13, 1967: 22-24. Z1219.S25, v. 50

The United States, too busy in Asia to pay much attention to events in Europe, is creating a new image on that continent--an image of indifference. While the Nation invokes a policy of do-nothingism and devotes its attentions elsewhere, Europeans have begun to rearrange their lives, unfettered by consideration of American persuasions and interests. In spite of the Americanization of European daily life, the restoration of its economic prosperity has enabled Europe to pursue strongly independent financial and political policies. East European nations are making overtures toward the West, primarily in economic matters, and

West Germany, for one, has shown great flexibility in circumventing its Hallstein Doctrine to deal with them. This in turn has given East European nations a new independence, and they are cautiously pursuing their own contacts. Many East Europeans still fear West Germany's nuclear intentions, but this does not hinder fresh commercial agreements. Europe is very much on the move toward a new future, a future to which the United States can accommodate itself when its interest reawakens, but also one over which it has very little control.

1256
Freund, Ludwig. [COEXISTENCE AND DETENTE; HOPE OR DANGER?] Koexistenz und Entspannung; Hoffnung oder Gefahr? Würzburg, Holzner-Verlag, 1966. 286 p. (Der Göttinger Arbeitskreis Veröffentlichung, nr. 338) DK274. F74
Bibliographical footnotes.

Contents.--Change in the Soviet ideological style and the relation of ideology to foreign policy.--Weak points in the position of the West.--Conclusion.

Expounds on the limitations of change in Soviet foreign policy and on discrepancies between West European and American political judgment with regard to East-West relations. Among other things, the Atlantic alliance's, especially NATO's, cohesion and its nuclear strategy are discussed.

1257
Gass, Oscar. CHINA, RUSSIA & THE U.S. Commentary, v. 43, Mar. 1967: 65-73; Apr.: 39-46. DS101. C63, v. 43

A two-part essay on a wide variety of topics related to the three countries, including the Sino-Soviet dispute, Soviet and Chinese industrial and agricultural capabilities, the origins of the Chinese cultural revolution, and the relations among the three nations in Vietnam. Gass predicts that the United States will retain a large lead over the Soviet Union and China in military power, wealth, industrial technology, and international influence in the coming years.

1258
Goldstein, Walter. A DYNAMIC NEW POLICY TOWARD A NEW EUROPE. Bulletin of the atomic scientists, v. 23, Apr. 1967: 17-22. TK9145. A84, v. 23

American diplomacy in Europe during the last decade has been characterized as "petrified." It has fed on a daily diet of the "metaphysical assumptions of containment" determining an unrealistic policy that has diminished U.S. influence in Europe. Today there is an urgent need for a new, dynamic policy toward Europe that will be flexible enough to endure the vicissitudes of international politics. This policy must have the unification of Europe as its primary objective in order to ensure an East-West detente and prevent East-West confrontations during non-European conflicts. As a first "small step," a treaty or agreement to control nuclear reactors in Central Europe should be ratified. This control of reactor facilities would ensure "that nuclear dissemination in Europe for military purposes would be firmly curbed." A further step would be troop reductions. Withdrawal of troops from Central Europe would end the "confrontation balance" without adversely affecting the doctrine of "graduated deterrence." Reductions of nuclear weapons would help dissolve the present threat perceptions resulting from superfluous nuclear stockpiles. Denuclearized zones and nuclear freeze proposals have in the past encountered many obstacles, and any agreement on them would have to be largely symbolic. However, the symbolic value of even a partial freeze would be greatly enhanced if it were accompained by a moratorium on antiballistic missiles [ABM] and/or a comprehensive test ban treaty. Liberalizing trade between East and West Europe, promoting the Kennedy Round tariff reductions, encouraging more nations to participate in the Common Market, and increasing Western investment in Soviet and East European industries would promote integration and provide a common ground for Europeans to stand on. The objective of European unity is unattainable unless the problem of reunifying Germany is resolved. The main obstacle to European unification however is not Germany but distrust--"distrust of our own diplomatic courage and of the political capabilities of former adversaries and allies" that has produced a stagnant international diplomacy. America must take the initiative in fostering integration movements within Europe, even at the cost of rejecting old and decadent policies based on nostalgia rather than political realism.

1259
Hedley, John H. MOSCOW'S NEW LOOK IN WESTERN EUROPE. Yale review, v. 56, Mar. 1967: 390-396. AP2. Y2, v. 56

Russia hopes to increase its influence in Western Europe by abandoning its traditional image as the principal threat to the security of that area for a more agreeable one. As hopes for peaceful coexistence rise, opportunities increase for the Soviet Union to undermine the unity of the NATO community. Through bilateral agreements Moscow hopes to take advantage of the diversity of interests among the European nations to accumulate economic and political benefits for Russia. The European desire for détente could favor Russia's goal of recognition of two German States if Moscow could point to West Germany as the party blocking détente. Moscow also hopes the disruption of West Germany's ties with its allies will change Bonn's opposition to West European contacts with Eastern Europe. Moscow expects a decline in U.S. influence in Europe with the increased acceptance of the Russian presence due to American involvement with events in Southeast Asia. Without a threat of direct military confrontation in West Berlin, Russia hopes to see Western interest in Berlin wane and opportunities open up for Russian economic, cultural, and political inroads into the city. Such overtures by the Soviet Union reflect a realistic and shrewd appraisal of the current European scene. Moscow evidences little fear of the risks generated by the new situation, such as the danger of the Warsaw Pact countries' following NATO's trend to disunity and the possible buildup of arms by West Germany in reaction to Russian advances to France and other Western countries. As part of the new policy, Moscow is also ensuring its continued favor in Eastern Europe by encouraging more contacts with the West. The decline of U.S. prestige in Europe coupled with a loosening of ties in NATO should allow Russia to quietly acquire tremendous gains under its new guise as a benefactor.

1260
Hinterhoff, Eugene. AN ELUSIVE DREAM OR A NOT TOO DISTANT PROBABILITY? NATO's fifteen nations, v. 12, Feb./Mar. 1967: 20-25.
UA646. F5, v. 12

Taiwan's opportunity to deploy its highly trained military forces in an invasion of mainland China depends on internal events in China, the development of U.S. foreign policy in Southeast Asia, and Soviet activities in the Far East. Although Mao Tse-tung has lost international prestige and has resorted to establishing the Red Guards to reinforce his diminishing popularity at home, he feels that in time China's influence will increase as nuclear achievements bolster its now relatively weak military forces. If the United States is involved in "search and destroy" tactics in South Vietnam over an extensive period of time, Red China's nuclear power could eventually give Peking bargaining power with the United States to divide Southeast Asia and the Western Pacific into two spheres of influence. Since this would abrogate U.S. commitments to Taiwan, the Nationalists would prefer a stepped-up strategy in the war, involving U.S. invasion of North Vietnam accompanied by an American invitation for Nationalist Chinese reinforcements. If the war further escalated into a confrontation between the United States and Red China, Chinese Nationalist troops supported by U.S. airpower would have an opportunity to attack Red China's southern border. In the event of a peaceful solution to the Vietnamese conflict prior to such a confrontation, the Nationalists would be forced to withdraw their troops along with those of the United States. From the Nationalist Chinese point of view, the best alternative to escalation in Vietnam would be war between China and Russia with Taiwan intervening on the side of Russia. On the other hand, Russia could thwart Taiwan's military objectives on mainland China if Mao were toppled and the Soviets regained leadership of the Communist world or if Russia chose to assume the role of mediator in establishing a neutral Southeast Asia.

1261
Humphrey, Hubert H. FIVE GUIDELINES FOR THE FUTURE. A POLICY STATEMENT BY THE VICE-PRESIDENT OF THE U.S. Common market, v. 7, May 1967: 103-108. P&GP RR

"Reformulates the long term aims of American policy toward Europe" and the West's "objectives vis-a-vis Eastern Europe." Vice President Humphrey emphasizes the importance of the West European integration effort and of the Atlantic partnership to peace and stability in Europe, and examines the achievements of the West's East European policy over the past 21 years.

1262
Lazitch, Branko. [THE KREMLIN'S EUROPEAN DIPLOMACY] La diplomatie européenne du Kremlin. Est & ouest, v. 19, Apr. 16-30, 1967: 1-5.
D839. A822, v. 19

Discusses Russia's attitude toward various European problems: NATO and the French withdrawal, West Germany, East Germany, European security, and the nuclear nonproliferation treaty. The author states that there are two obstacles which prevent full accord between Russia and the United States on the nuclear nonproliferation treaty: French withdrawal from the Eighteen Nation Disarmament Committee (ENDC) and the specter of West German control of atomic weapons. The author notes Russia's lack of realism in the pursuit of its diplomatic objectives.

1263
Lichtheim, George. BRITISH ALTERNATIVES. Commentary, v. 43, Apr. 1967: 47-51.
DS101. C63, v. 43

Britain's application for entry to the European Economic Community [EEC] will be rebuffed, largely due to Prime Minister Harold Wilson's political and diplomatic ineptitude. The alternatives to EEC membership are not very attractive, particularly the U.S.-proposed Atlantic Union that would involve the economic and political subservience of Britain to the United States. Wilson's enthusiastic backing of the proposed nonproliferation treaty is a prime example of how Wilson has lost support for Britain in Europe. Wilson should have recognized that, quite aside from the questionable practical value of the document, it was a matter between the Soviet Union and the United States. Britain had no need to play so prominent a part in its support during preliminary negotiations--a move that left West Germany with little inclination to pressure De Gaulle into accepting British EEC membership. Furthermore, by making it plain that they oppose creation of a European nuclear force equal to the U.S. and Soviet forces, the British have created serious doubts concerning their European loyalties. Had they refused to sign the treaty they could have gained leadership in Europe; had they agreed to sign quietly they could have avoided any special responsibility for the matter. Achievement of a Europe based on Anglo-French cooperation will probably be left to Mr. Wilson's Conservative Party successor.

1264
Mozingo, David P. CONTAINMENT IN ASIA RECONSIDERED. World politics, v. 19, Apr. 1967: 361-377.
D839. W57, v. 19

That containment measures in the Far East have not yielded results comparable to those achieved in Europe has been apparent for some time. The nation-state system was highly developed in postwar Europe, whereas in Asia the question has not been how to rehabilitate a traditionally functioning system, but how a new system should evolve and mature. Until recently the Western powers agreed as to the nature of the Soviet threat in Europe and how to meet it, but a containment strategy in Asia is not effective because Asian nations are beset by long-standing enmities that they consider more serious than the threat from China. The aims and direction of Chinese foreign policy in Asia also differ from those of the Soviet Union in Europe. Most Asian nations see China's belligerence as an outgrowth of its rivalry with the United States over Taiwan and refuse to aline with either. China's foreign policy actions, in contrast to its statements, are restrained, and its diplomatic efforts to prevent its neighbors from being drawn into the American anti-China camp have taken priority over its commitment to support Communist revolutions. As China's nuclear power increases it could become more bellicose. However various powers other than America stand in China's path toward domination in Asia, notably Russia, Japan, Pakistan, India, and Indonesia. Southeast Asian nations have shown little inclination to enter China's orbit (or anyone else's), and the local Communist parties are nationalistic and independent.

China is generally given too much responsibility for disturbances in Asia and indigenous forces too little. Corruption and incompetence in national governments, more than Chinese military power, are the greatest incentives to communism in Asia. The United States cannot redeem the image of a harsh and unpopular government or force an unwilling regime to make desired social changes. Indispensable to prevention of communism in Asia is the development of governments that have the support and confidence of their people. Nationalism, not U.S. or Chinese power, is the strongest force in Asia today.

1265
Nationale Front des Demokratischen Deutschland. WHERE IS THE FEDERAL REPUBLIC HEADING? FALLING INTO LINE FOR THE THIRD TRY; DOCUMENTATION ON CAUSES, AIMS AND METHODS OF THE PEACE-ENDANGERING POLICY OF THE WEST GERMAN STATE. [Berlin, National Council of the National Front of Democratic Germany, 1966] 76 p. illus. DD259.2.N353
Translation of Wohin steuert die Bundesrepublik?

Contents. --Why is the CDU-led Federal Republic the main disturber of the peace in Europe? --The transition from authoritarian rule to the formed society of state monopoly capitalism and its CDU oligarchy. --The Grey Plan for plundering the GDR.

Sees in West Germany's capitalist makeup and policy and in its imperialistic goals the principal reasons for its arms buildup and for its aggressive plans to annex East Germany.

1266
Nationale Front des Demokratischen Deutschland. Nationalrat. [GERMANY'S SPLIT AND THE ROAD TO REUNIFICATION. A DOCUMENTARY OUTLINE] Die Spaltung Deutschlands und der Weg zur Wiedervereinigung. Ein dokumentarischer Abriss. Dresden, Zeit im Bild, 1966. 119 p. DD257.25.S67
Bibliography: p. 109-119.

Contents. --1945 to 1949: The road to partition. --1949-1955: All-German elections or remilitarization and joining NATO. --1956-1961: Confederation or aggression. --1961-1966: Understanding through peaceful coexistence or deepening of the split through nuclear armament.

Argues that Germany's partition was caused by the West's, especially Bonn's, imperialistic tendencies with regard to East Europe--by West German territorial claims, the West's policy aimed at the abolition of the status quo in Europe, and West European armaments, among other things. The book outlines the German Democratic Republic's 20-year effort to achieve European peace and security.

1267
Oglesby, Carl, and Richard Shaull. CONTAINMENT AND CHANGE. New York, Macmillan [1967] 248 p. E744.035

Contents. --Vietnamese crucible: an essay on the meanings of the Cold War, by Carl Oglesby. --Revolution: heritage and contemporary option, by Richard Shaull.

Two essays that grew out of an informal discussion sponsored by the University Christian Movement, which took place at the Union Theological Seminary in New York. Oglesby attempts to explain the roots of the cold war, and finds them in the business orientation of "free enterprise" capitalism. Vietnam, he feels, "is a revelatory Cold War crisis, and . . . the cold war itself is a terminal crisis of Western identity." He explodes the domino theory and attempts to show that, far from helping the Third World, American Government and private economic involvement creates a self-serving empire. To Oglesby, America is at least as much to blame for the cold war as Soviet Russia. Shaull's essay examines the revolutionary, and concludes that the youth of America may well rediscover the American revolutionary spirit and start crusading for a new justice for society and the world.

1268
Popper, David H. CHINA, THE UNITED NATIONS, AND THE UNITED STATES. In U.S. Dept. of State. Department of State bulletin, v. 56, May 1, 1967: 689-695. JX232.A33, v. 56

Explains the background of Washington's current stand regarding admission of Communist China to the United Nations. Mr. Popper, Deputy Assistant Secretary of State for International Organization Affairs, attempts to explode the myth that the United States has single-handedly kept it out. Rather, he says, it has long been obvious to most U.N. members that the Communists in China have very little regard for participation in the world body, or its aims and philosophy. Also contrary to popular belief, the United States does not have an inflexible China policy, nor is this policy vindictive for its own sake. Change in Peking's attitude will meet with carefully considered response from Washington and from the United Nations.

1269
Reidy, Joseph W. STRATEGY FOR THE AMERICAS. New York, McGraw-Hill, 1966. 204 p. (A Foreign Policy Research Institute book) F1418.R42
McGraw-Hill series in international development.
Bibliography: p. 187-197.

Contents. --Westernization: a framework for United States strategy. --The Atlantic triangle. --The operational approach. --Background for decision. --Contemporary currents. --United States-Latin American issues. --Communism in the Americas. --The United States impact upon Latin America's modernization. --Agenda for action.

Considers the "defense of the Americas from hostile attack or internal subversion" the most important objective of the United States in Latin America. Reidy suggests reassessment of the United States' strategic military requirements in Latin America and proposes a policy based on "an Atlantic Triangle" that would incorporate both Latin America and the Atlantic alliance.

1270
Sapin, Burton M. THE MAKING OF UNITED STATES FOREIGN POLICY. Washington, Brookings Institution [1966] 415 p. JX1706.S3, 1966

Contents. --Introduction. --Some fundamental characteristics of the system--The congressional

setting.--The President and the national security organization.--The Department of State.--The role of the military establishment.--Economic, information, and cultural agencies.--Science and foreign policy.--Field missions.--Intelligence, planning, and policy analysis.--Personnel.--Conclusion.--Appendixes.--Index.

Studies past and present accomplishments of the U.S. foreign-policymaking apparatus and examines the problems of strengthening leadership, coordinating related and overlapping activities, developing procedures to replace "crisis management," introducing modern technology, and updating the personnel structure. The author finds that, on the whole, the Department of State has had remarkable success in gathering intellectual and organizational resources to meet the problems of the mid-20th century. He is against drastic proposals to reorganize the Department in the belief that, while such proposals may be "superficially appealing, they create more problems than they solve."

1271
Seebohm, Hans-Christoph. GERMAN FOREIGN POLICY AND EXPELLEE CLAIMS. Central Europe journal, v. 15, May 1967: 147-150.
DB200.7.S74, v. 15

Dr. Hans-Christoph Seebohm expresses concern over the fact that the free world generally and the United States especially have succumbed to the illusion that Moscow has given up its dream of world revolution. Each free nation pursues its own foreign policy toward the Soviet Bloc, overlooking the fact that only a uniform world policy can be effective in fulfilling a common purpose. Western Germany has taken an independent course in dealing with Central and Eastern European States, treading heavily on the toes of her allies. France consequently made several unfortunate agreements with Moscow, and the US turned more and more intently to the pursuit of her Pacific interests. This, the author feels, is just the kind of stupor into which the Soviet Union wants the world to sink under the guise of "relaxation of tension." In the long run, Russia hopes to effect recognition of the Oder-Neisse Line and renunciation of the Potsdam Agreement as well as recognition of the "German Democratic Republic." In addition, she wants to promote western diplomatic relations with the East Bloc States to bolster her own stagnant economy. This will, in turn, revive the question of the citizenship of expellees from Central European States. Dr. Seebohm appeals to Germany and to the expellee Landsmannschaften to be more adamant than ever in pleading for recognition of the right of self-determination for all peoples. Close cooperation with France, who is sympathetic to German-Central European problems, is the only road to a lasting solution. Closer contact should be fostered with Great Britain, although Germany, for the sake of her relations with France, should not press British entrance into the EEC. He raises a warning finger at the US, with whom Germany has always worked jointly against Bolshevist aggression, to snap out of its doldrums. (Abstract supplied)

1272
Selton, Robert W. SINO-SOVIET CONFLICT IN THE DEVELOPING AREAS. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, Jan. 1967: 42-50. illus.
Z7623.U35, v. 47

Sino-Soviet differences are evident in the strategy and tactics of "national liberation" movements in the emerging nations of Africa and Asia. The Chinese Communists foster violent upheaval and revolution, while the Soviet Union's initial objective is to eliminate or prevent Western influence--not to establish the new nations as their dependencies. Since China is not militarily preponderant and cannot support economic aid programs it has been forced to advocate "people's" wars in the hope that it may attain leadership of the bloc of non-white peoples in Asia and Africa. Thus China has emerged with interests and objectives totally different from Russia's. These divergencies have resulted in keen competition between the two countries for status and prestige in the emerging nations and rivalry for hegemony over local Communist movements in these areas. Consequently, Communism does not exist any longer as a monolithic ideological force. This fact necessitates a redefinition of U.S. foreign policy objectives in its attempt to contain the spread of communism. Soviet and Chinese interests inimical to those of the United States must be treated as separate entities and countered by specific methods.

1273
SOVIET GAME IN THE WORLD: IS IT PLAYING OUT? U.S. news & world report, v. 62, June 26, 1967: 36-38. illus.
JK1.U65, v. 62

Assesses Soviet successes and failures in the Communist attempt to shape an empire. The scoreboard shows one Russian loss after another, and most observers feel that the Kremlin will not give up the game, but rather change the rules.

1274
Uhalt, Alfred H. DE GAULLE: ENIGMA IN THE WESTERN ALLIANCE? Air university review, v. 18, Mar./Apr. 1967: 69-77.
TL501.A5574, v. 18

Investigates the political concepts and international policies of Charles de Gaulle. Uhalt depicts the French President as a man with a vision--that France will attain military and political autonomy and lead Europe into a new unity. Although De Gaulle is regarded as a stumbling block in Franco-American relations, Uhalt notes that his policies are frequently misunderstood; that he strives to protect Europe against foreign domination and that his recognition of Red China was not dogmatic but realistic.

1275
Ulbricht, Walter. WHAT IS AT STAKE IN GERMANY? Dresden, Zeit im Bild [1966] 46 p. (Documents on the national policy of the GDR, 6/1966)
DD257.U415

Contents.--From the speech of Walter Ulbricht in the People's Chamber of the GDR on 13 October 1966.--Discussion of Walter Ulbricht with West German journalists on 12 October 1966.

Appeals to all nations to maintain normal relations with both German States for the consolidation of peace in Europe. Ulbricht declares East Germany ready to enter into negotiations with the Bonn government to normalize relations between both Germanies. He accuses West German leaders of entertaining plans to annex the German Democratic Republic.

1276
U.S. TO SHIFT ITS COURSE IN THE WORLD? END OF ROLE AS WORLD POLICEMAN? U.S. news & world report, v. 63, July 3, 1967: 32-34. illus.
JKI.U65, v. 63

U.S. policymakers predict that the United States will play the role of world policeman less often in the future and limit its aid and treaty commitments to global areas directly involving its national interests. The growing hostility of the Middle East and India towards the United States, the increased Communist influence in Africa, and the confused Asian situation reflect the failure of the vast U.S. expenditures for foreign aid. The increase in this aid burden resulting from the disintegration of postwar alliances further highlights the need for policy change. Today U.S. decisions on overseas activity will be more closely governed by the two factors of treaties and national interests. The United States will pay more attention to the problems of the Western Hemisphere and continue to protect its interests in Western Europe and the Pacific Islands. It will become less involved in regional disputes and emphasize economic aid to encourage internal stability in foreign countries. Although America will not drift into isolationism, policymakers will avoid "blank-check commitments."

1277
Vaslef, Nicholas P. SOME POLITICO-MILITARY ASPECTS OF THE SINO-SOVIET RIFT. Air university review, v. 18, May/June 1967: 71-75.
TL501.A55, v. 18

The Sino-Soviet rift which was characterized during its incipient stages as an ideological struggle has since developed "into a struggle embracing principles and characteristics more nationalistic than ideological." This nationalistic struggle has military and political accompaniments which could induce the United States and Russia to formulate their Far Eastern policy objectives in a more compatible atmosphere. Such an atmosphere may be enhanced as a result of conflicts between China and Russia (which include the question of Outer Mongolia and the Sino-Indian border disputes) and Russia's interference in what traditionally has been the Chinese sphere of influence, namely, Southeast and Central Asia. In this context the problem of Vietnam is the most important facing the United States, U.S.S.R., and China. China, faced with a possible loss of prestige and "political leadership," may attempt to resolve her dilemma in North Vietnam by committing troops there. Such a decision would have propaganda value because it would shift the focus from internal to external problems, and thus would enable Chinese leaders to consolidate their position in the face of increasing dissension and "revisionism." This action would in all probability bring the Soviet Union and the United States closer together. The U.S.S.R. would not like to see the Chinese enter Vietnam because this "would undermine Soviet world leadership in the Communist movement, as well as provide a danger of provoking World War III." If Chinese forces do enter Vietnam the feasibility of an East-West détente--already being realized in negotiations between the United States and Russia on nonproliferation, air routes and trade--would be greater, and could pressure the Chinese into pursuit of foreign policy objectives more amenable to the United States.

II. THE STRATEGIC ENVIRONMENT

A. MODERN WAR

1278
Barnhart, Ron. AF CAMBRIDGE LABS SPENDING 10% OF R&D ON LIMITED WAR. Technology week, v. 20, Apr. 24, 1967: 22-23.
UG630. M54, v. 20

Limited war research currently accounts for 10 percent of the budget of the Air Force Cambridge Research Laboratories, where some 20 different programs directly related to military problems in Southeast Asia are being pursued at a cost of $4 million. Work is being done mainly in the areas of meteorology, communications, detection and surveillance, and reconnaissance. Climatological studies are aimed at improving work on weather forecasting, particularly during the monsoon season. Communications specialists are seeking ways to create an artificial ionosphere at 60,000-80,000 feet to reflect and increase the range of radio transmissions in mountain and jungle terrain. A radar system to detect metal targets (such as ground vehicles) in heavy vegetation is in the development stage as part of Project Shedlight. Project Shedlight is also investigating the use of low-light-level television techniques for night surveillance and reconnaissance. Two types of airborne magnetic-detection systems are under study, one employing a total-field multisum magnetometer and the other a gradient radiometer. An acoustic bullet detector that can filter out noise generated by an aircraft and permit crew members to detect and evade ground-based small-arms fire is also in progress.

1279
Beaumont, Roger A. THE MILITARY UTILITY OF LIMITED WAR. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, May 1967: 53-57. Z6723. U35, v. 47

Illustrates by historical example the limitations of localized wars as practice grounds for military weapons and tactics. Traditional practices may not wholly apply to new experiences, and the transfer to future organizations of lessons learned in specific wars may not be beneficial. Examples of European and American experiences during the past two centuries illustrate the deficiencies of relying on tactics inherited from the past. Recent limited wars demonstrate sadistic tendencies in troops in isolated tribal areas who are forced to counter guerrilla tactics with police functions. The image of the professional military suffers thereby. Further, troops trained in temperate zones have been exposed to tropical diseases. Thus doctrine and personal habits derived from a particular conflict may prove as much a liability as an asset in guiding future combat situations.

1280
Bonin, Bogislaw von. [IS THERE ANY MILITARY THREAT FROM THE EAST? CONSIDERATION OF THE MILITARY-POLITICAL SITUATION] Gibt es eine militärische Bedrohung aus dem Osten? Betrachtungen zur militärpolitischen Lage. Blätter für deutsche und internationale Politik, v. 12, Feb. 1967: 142-154. D839. B57, v. 12

Lecture delivered to the German-Soviet Association (Deutsch-Sowjetische Gesellschaft e. V.) in Frankfurt/Main.

The present Soviet-American military balance rules out the usefulness of short-range atomic weapons in any nuclear war between the two nations. Each superpower, even if it received the first strike, would be perfectly able to inflict irreparable damage on the other by long-range rockets. Distance in modern nuclear warfare has ceased to count as an important factor. In any nuclear encounter the United States and the Soviet Union must resort to their least vulnerable and most effective weapon, the ICBM. Neither side can expect the other to voluntarily forfeit, at the risk of its survival, the full use of the military potential of these arms. In any such emergency ICBM's will be used instantly and in quantity. Both the American tactical nuclear weapons in Europe and their Soviet counterparts are but "relics of a phase of development" that is now completely outdated. The Soviet bloc cannot launch a conventional large-scale surprise attack. This would require prior redeployment of the bloc's troops, including large-scale transportation of Soviet troops from the Soviet Union to other Warsaw Pact countries--a move which would be immediately discovered by the West. Without an element of surprise the Soviet Union would not be able to count on the success of any such offensive. Conventional attack, then, cannot be a strategic alternative to a nuclear first strike. But limited conventional surprise actions are possible between the Baltic Sea and the Alps, especially on the border between the two Germanies. These could easily turn into total nuclear war if forces deployed on either side threatened the other. Therefore German interests would be best served by renouncing nuclear weapons on its territory and removing NATO and Warsaw Pact forces from it. The nuclear umbrella represents viable protection for West Germany and West Europe against a massive Soviet surprise attack. As for its own military forces the German Federal Republic should limit their strength to about 150,000 volunteers, and assign them to protecting the frontier.

1281
Clapp, L. C., and others. A STUDY OF CONVERSATIONAL ON-LINE INTERACTION IN MAN-MACHINE WAR GAMING. Newton, Mass., Computer Research Corp., 1966. 74 p. (Computer Research Corporation. Report R102-4)
AD 640057.
L.C. copy on microfiche. Sci RR

Describes the results of a study of war gaming using on-line interaction between man and computer. The study concludes that "analysis and war gaming

276-835 O-67—2

capabilities can be increased significantly using a time-sharing computer system with appropriate software and remote-access terminals."

1282
Coats, Wendell J. ARMED FORCE AS POWER: THE THEORY OF WAR RECONSIDERED. New York, Exposition Press [1966] 432 p.
U104. C6
"Bibliography": p. 383-413.

Examines war as a "constituent element of the history of mankind." Brigadier General Coats sees the concept of battle as central to the study of war. Modern battle is the "consequence of a rational process," with the increasing rationalization of society maximizing violence in battle. In fact, the threat of increased violence in modern war has been used as a justification of the employment of total force to achieve total victory. From his analysis of battle, its background, process, and relationship to decision, strategy, national policy, law, and ideology, General Coats concludes that military power is more than a mere extension of political power. He finds that much contemporary analysis of violence is flawed by the confusion of deterrence with strategy, the overwhelming importance of deterrence notwithstanding. Arms control measures can add to stability, particularly if both sides wish to establish and maintain a stable military environment. In any event, armed force--as an institution designed to maintain and defend a political entity--is an integral facet of government.

1283
Gabelić, Andro. LOCAL WARS AND WORLD PEACE. Review of international affairs, v. 18, July 5-20, 1967: 8-9. D839. R4, v. 18

Israeli aggression against the Arab nations resulted in more than a local war; it represented a universal, global conspiracy against the peaceloving and progressive nations of the world. Local wars have become the instrument of imperialist nations that seek to overthrow peaceloving nations by a "strategy of indirect approach." U.S. imperialists are afraid of a nuclear confrontation. This policy of limited war, local intervention, and coups d'etat will irrevocably lead to world war. The most effective defense against such aggression is local defensive war, waged by a conventional army capable of defeating the imperialist strategy.

1284
STUDY "PROBLEMS OF STRATEGY IN CHINA'S REVOLUTIONARY WAR." Peking review, v. 10, Jan. 13, 1967: 14-19. DS701. P42, v. 10
Translated from Jiefangjun Bao [Liberation Army Daily] Dec. 29, 1966.

Chairman Mao's brilliant work on strategy that summed up China's experiences and victory in the second revolutionary civil war first appeared 30 years ago, but its continued relevance and importance to revolutionary struggles today is clear. Chairman Mao exorts us to use guns and revolution to wipe out counter-revolutionary war. Only through the power of the gun can the working masses overthrow U. S. imperialism and all reactionaries and gain the people's rights. Chairman Mao has also said we must "rely on the masses and wage people's war." People alone, and not modern weapons, are the force behind world history and the decisive factor in war. The strategy of people's war involves flexibility in tactics and concentration of forces. It is a war of annihilation. Those directing the war must master its laws and show initiative in its direction. "The basic guarantee for winning revolutionary war is the resolute and thorough carrying out of Chairman Mao's correct line." We must defy death to defend and implement the correct line of Mao's thought.

B. MODERN WEAPONRY AND RELATED TECHNOLOGICAL DEVELOPMENTS

1285
[AVS PROJECT IS ENTERING A NEW PHASE] Das AVS-Projekt tritt in neue Phase. Flugwelt, v. 19, Apr. 1967: 211. TL503. F626, v. 19

Relates the history, from 1963 to date, of a joint West German-United States project for development and construction of a heavy VTOL/STOL aircraft weapons system. Functional characteristics of some of the aircraft's components are also briefly discussed

1286
Alexandros, L. [ROCKETS OR AIRPLANES?] Raketen oder Flugzeuge? Wehr und Wirtschaft, v. 11, Apr. 10, 1967: 225-226.
U3. W38, v. 11

Egypt's ambitious armaments effort, based on a stagnant economy, has caused permanent insolvency for the nation. Its total foreign liabilities amount to $2,484 million. $198 million of those debts come due this year, although Egypt can hardly afford to put aside foreign currency assets to pay its debts. Its vital imports in food and fuels consume almost its entire earnings in foreign currency. Nasser's long-standing economic policy has put a disproportionately high premium on industrial development to the detriment of agriculture. The 1966/67 state budget provides $372 million for industrial development. This includes outlays for the defense industry, for example, $80 million for producing rockets and supersonic aircraft. Strategic and marketing considerations have caused Nasser to think of abandoning the production of Mach-2 aircraft in favor of expanding the rocket line. Egypt's "regular military expenses," amounting in 1966/67 to $480 million (exclusive of investments in the defense industry), surpass Israel's total defense costs of $376 million (for fiscal 1967/68) even though its gross social product is only $3,298 million (1966) versus Israel's $3,120 million. As for Israel, its total defense costs for 1967/68 amount to 18.5 percent of the nation's "Total Budget," which consists of "the Ordinary Budget," "the Development Budget," and "the Special Budget." It probably represents the world's highest ratio of defense expenditures to total expenditures for a single state. Israel's whole economy is enormously strained, despite such remedies as a growing emphasis on domestic military-hardware purchases (partly from foreign subsidiaries in Israel) at the expense of imports.

1287
[ARMAMENTS INDUSTRIES OF EUROPE'S NEUTRAL STATES (V-VI)] Die Rüstungsindustrien der neutralen Staaten Europas (V-VI). Osterreichische militärische

Zeitschrift, v. 5, Jan./Apr. 1967: 42-46, 145-147. illus. P&GP RR

Reports on the Swiss company Pilatus-Flugzeugwerke, producer of military aircraft including the world-famous, multipurpose STOL "Porter." The article describes the company's expansion since its founding in 1959, its principal owners (Oerlikon Bührle & Co, Watt AG, Glarus, A. Gazda), its financing, its various military aircraft projects, and the general technical specifications of the aircraft produced.

1288
CARRIER "JFK": QUARTER-BILLION BLUNDER? U.S. news & world report, v. 63, July 17, 1967: 89. JK1.U65, v. 63

The newly christened aircraft carrier John F. Kennedy seems to the Navy to be an example of the misguidedness of Defense Secretary McNamara's cost-effectiveness policies. The JFK burns oil; top Naval advisers, members of Congress, and the Atomic Energy Commission all feel it should have been a nuclear-powered vessel. The JFK can go as fast as a nuclear-powered ship, but not for as long; because it must carry a great deal of fuel, only one-third of its storage space can be used for ammunition and fuel for its aircraft. The conventionally powered carrier is strategically dependent on oil tankers and bases where oil is available--the shutdown of Arab oil supplies that resulted from the recent Middle East war has dramatically pointed up this "achilles' heel" of the Navy. A nuclear carrier would, indeed, have cost more than the Kennedy--45 percent more. But upkeep would have run only 10 percent more than for a conventional vessel, and the strategic advantages of nuclear power would almost surely have overbalanced the extra cost. It is too late to convert the JFK, and Navy spokesmen fear the fleet will sail into the nuclear age with obsolete propulsion.

1289
Christ, Rolf F. DER "INTERNATIONAL FIGHTER"--MADE IN U.S.A.? Wehr und Wirtschaft, v. 11, Apr. 10, 1967: 210-211. U3.W38, v. 11

The Western air forces are at present engaged on a detailed international study of the requirements for the next generation of tactical fighters. At the moment no fewer than five different projects have been put forward in the various countries. For reasons of economy attempts are being made to arrive at agreements on joint development of such aircraft. However, the U.S. Department of Defense's recent campaign for an "international fighter" appears to be based less on a genuine desire for cooperation than on an unmistakable preoccupation with pure American interests. The idea seems to be to torpedo both the joint German-American V/STOL project and the Anglo-French VG aircraft, and so clear the way for an "everyman fighter" with the label Made in USA. Let us assume that what has so far been said about the "everyman fighter" is merely a trail balloon to test European reactions. All well and good; but in that case it would be wise to consider how the Europeans view such a machine. Certainly not as something to be supplied direct from the USA, cash down and ready to go! (Abstract supplied, modified)

1290
Christ, Rolf F. THE SWISS AIR FORCE--DEFENDERS OF NEUTRALITY. Air Force and space digest, v. 49, Oct. 1966: 70-78. UG633.A65, v. 49

The Swiss Air Force currently consists of about 500 aircraft. The backbone of the ground attack squadrons is the Hawker Hunter F. MK. 6 strike fighter, which was purchased from Great Britain. The obsolete Vampire F. B. MK. 6, which is still proving eminently suitable for mountain operations, and the de Havilland Venom make up the bulk of the Air Force. The Swiss Air Force will beef up its operations with the new Dassault Mirage IIIB and IIIRS supersonic tactical fighters.

1291
Cribbs, J. A. EVALUATION OF THE PHASE-LOCKED INTERFEROMETRIC TRACKING SYSTEM (PHINTS). Patrick Air Force Base, Fla., Radio Corporation of America, 1966. 83 p. (Radio Corporation of America. Technical report ETR-TR-66-6)
AD 637273.
L.C. copy on microfiche.
Sci RR

Research sponsored by the United States Air Force under contract no. AF 08(606)-7500.

Describes the Phase-Locked Interferometric Tracking System which is "a passive HF-VHF radio interferometer which employs baselines five wavelengths long. Its use as a pulse radar acquisition aid was evaluated by a series of satellite tracking tests."

1292
[DEVELOPMENT OF AVIONICS SYSTEMS FOR V/STOL FIGHTERS. OPERATIONS RESEARCH STUDY OF EQUIPMENT FOR A V/STOL COMBAT AIRCRAFT (Part 1)] Avionik-Systementwicklungen für V/STOL-Kampfflugzeuge. Operations Research-Studie über die Ausrüstung eines V/STOL-Kampfflugzeugs (1. Teil). Wehr und Wirtschaft, v. 11, Apr. 10, 1967: 212-215. illus. U3.W38, v. 11

It happens from time to time in the history of the military operation of aircraft that missions and types of operation and hence necessary equipment undergo a radical change. A case in point is the V/STOL tactical aircraft, though despite years of research and development this type of aircraft has still not reached adulthood. A plane such as the V/STOL was needed because it would stand a better chance of escaping nuclear attacks and retaining operational capability even when the home base was destroyed. However, its capacity for dispersal and for operation from often makeshift landing grounds raises problems which should not be underestimated. Sub-systems must be extremely reliable, repair and maintenance of these sub-systems, including armament, must be simple and rapid, and an efficient system of command and surveillance is needed so that aircraft can take off on operations and be controlled during the operations. The cost of the desired high level of reliability and operational readiness varies considerably, but that of ensuring optimum matching of hardware, design features and maintenance and operating requirements can be estimated. In the development of a new aircraft its required performance is often several stages above that of the current generation of operational aircraft. The new machine must fly faster, have better climb performance, operate with

a higher load factor and carry a bigger payload. As a rule, the aircraft does meet these requirements when development is complete, but this does not necessarily guarantee that it will be successful when it has to be used. The aircraft's ability to fly at low altitude but avoid ground obstructions, to maintain communications under the most varied operating conditions, to find the target at high speed and evade the defences at low speed, and yet to strike rapidly and effectively, is often not considered until the new aircraft has completed its flight testing. One main problem, whose repercussions often do not appear until later, is that too little thought has been given to designing the aircraft and its electronic equipment as an integral whole. (Abstract supplied, modified).

1293
Donne, Michael. SWEDEN KEYS NEW WEAPONS TO "TOTAL DEFENSE." Armed Forces management, v. 13, Feb. 1967: 76-80. illus.
UB153. A65, v. 13

A look at Sweden's weapons systems and defense posture, with emphasis on development of the newly constructed "system 37"--the supersonic aircraft, Viggen. The author points out that most weapons and armaments in Sweden's military arsenal are manufactured by the Swedish firms SAAB Aktiebolag and Bofors. There are exceptions--the British Bloodhound and the U.S. Sidewinder--but principally Sweden relies on its own economy to supply arms. These weapons are to be used in a defensive war, and civil defense and psychological departments are preparing the population for this type of war. Underground factories and shelters indicate the extent to which the Swedes have adapted their natural terrain to military and industrial production. As a result of this renaissance in defense posture, neutral Sweden would inflict a heavy toll on any would-be aggressor.

1294
Dulberger, Leon H. ADVANCED ROTARY-WING AIRCRAFT. Space/aeronautics, v. 47, Apr. 1967: 68-82. illus.
TL501. A786, v. 47

Describes research advancing toward the goal of developing a composite aircraft within the next 10 years. Various engineering approaches are aimed at the same concept--designing a composite vehicle capable of rotary takeoff and conversion into a fixed-wing vehicle for increased forward speed. The new vehicle will greatly increase the military versatility of the helicopter.

1295
Edmonds, Martin. INTERNATIONAL COOPERATION IN WEAPONS PROCUREMENT: THE IMPLICATIONS OF THE ANGLO-FRENCH CASE. International affairs (London) v. 43, Apr. 1967: 252-264.
JX1. I53, v. 43

The cooperation of the British and French aerospace industries in the acquisition of the Breguet 121 "Jaguar" has laid the foundation for possible future collaboration at all decisionmaking levels of Anglo-French weapons procurement. For the first time the decisionmaking process surrounding a major weapons system has had to take into consideration the defense requirements of another country. The Anglo-French agreement is meaningful because it points out specific problems that could confront nations which may want to collaborate in the procurement of arms in the future. First, the very fact that this is an agreement only between two aerospace industries means that total integration of decisionmaking in defense policy and military production is merely under consideration. Second, because collaboration at all levels must include this type of integration, it will be necessary for Britain to change its organizational structure of weapons procurement to include officials, politicians, and servicemen of another country. Third, such problems as language, different systems of measurement, and choosing a location for a building complex can plague effective international collaboration at any governmental or production level. A problem will also occur in distinguishing between the established organization of agencies involved in weapons acquisition and the agencies' personnel. These two levels, the formal and informal, will have to communicate with one another effectively because of the need to harmonize the performance parameters and cost and time scales of both sides' procurement programs. The fourth problem involves the production aspect of weapons procurement. The importance of production and its effect on collaboration can be seen in the British proposal to merge BAC with Hawker Siddley and in the planned French merger of Nord Aviation and Sud Aviation along with bringing together Breguet and Marcel Dassault. It is obvious that the firms' involvement in what should be built is as essential to international collaboration as are government and executive decisionmaking policies. The present Anglo-French agreement is at best an embryonic concept of one form of international collaboration in weapons procurement. If however the implications of this agreement are brought to light, the ultimate rewards may include political as well as economic integration of Europe.

1296
Frank, Lewis A. THE ABM DEBATE. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, May 1967: 45-52.
Z6723. U35, v. 47

Increased intercontinental ballistic missile production and installation of the antiballistic missile [ABM] Galosh by the Soviet Union, together with the rapidly developing Communist Chinese nuclear capability, point out the need to discuss the creation of a missile defense system by the United States. Using the Army's ABM Nike-X as a basis, defense planners are considering establishing either a light anti-Chinese type system or a full-scale sophisticated system at twice the cost. Opposition to any ABM system can be categorized as psychological-philosophical, political, and technical-economic. The failure of the Soviet defensive measures to provoke the United States and the fallacy of applying standard psychology to international affairs tend to invalidate the philosophical fear of the danger in altering the balance of power. Politically an ABM system is less provocative than stockpiling weapons, and yet it creates the strong position necessary to contain America's nuclear rivals. The technical-economic argument can be countered by recent improvements in the versatility of the ABM's as well as the increasing realization of the need for expenditures to protect population centers in terms of "damage limitation." In light of the Soviet and Chinese nuclear advances, an ABM system could prove a satisfactory solution for defending not only the United States but also its NATO allies.

1297
Gambu, Jacques. SAAB 37 "VIGGEN." Aviation magazine, no. 466, May 1967: 30-35.
TL502.A854, 1967

A detailed description of the SAAB 37 "Viggen," Sweden's newest supersonic aircraft, which is capable of maintaining speeds of up to Mach 2.5. A few interesting features of this plane are: a canard surface, a raised cockpit for visibility at all angles, a thrust reversal that enables the plane to land on short runways--in Sweden dispersed highway bases are being built for short landings and quick refueling--and an electrical system that delivers a three-phase current. The author also describes the RM-8, the power unit of the Viggen--a turbo-fan engine being developed for supersonic aircraft.

1298
Geiger, G. J. RUSSIA'S SCUD MISSILE. Ordnance, v. 51, May/June 1967: 610-611. illus.
UF1.O67, v. 51

Discusses the Soviet SS-1 surface-to-surface tactical missile [SCUD]. SCUD has range of 136 miles, and was designed for use as nuclear artillery at the field army level. According to the author, the mobile SCUD units are Russia's answer to the "shoot-and-scoot" problem.

1299
Giese, Fritz E. [THE STATE OF NUCLEAR ARMAMENTS FOR A NAVAL WAR] Der Stand der nuklearen Seekriegsrüstung. Wehr und Wirtschaft, v. 11, July 10, 1967: 406. U3.W38, v. 11

Information on the number and general characteristics of nuclear-powered armed naval units of the American, British, French, and Soviet navies. Giese discusses, among other things, the strengths of these countries' nuclear-powered submarine fleets.

1300
Giese, Fritz E. [WHERE DOES THE WEST GERMAN NAVY STAND TODAY?] Wo steht die Bundesmarine heute? Wehr und Wirtschaft, v. 11, Apr. 10, 1967: 218. U3.W38, v. 11

Reports on the present status and strength of the West German Navy as compared to those of other nations. Although it is by no means a "high sea fleet," of the world's small navies only the German Federal Republic's has really modern equipment.

1301
[THE GERMAN ARMY'S NEW TANK GENERATION: THE "LEOPARD" AND THE "KAMPFPANZER 70"] Die neue Kampfpanzergeneration des deutschen Heeres: "Leopard" und "Kampfpanzer 70." Wehr und Wirtschaft, v. 11, May 20, 1967: 281-287. illus.
U3.W38, v. 11

The new German Leopard battle tank presents the optimum combination of fire power, mobility and protection possible in the present state of the art and unites the required qualities in a balanced relationship. The development of this tank, which is now being delivered to the German armoured units, led to a simplicity of design much commended by the experts combined with far-reaching standardization. The trouble-free handling of the whole programme, including a production operation spread over the whole of the Federal Republic, has naturally brought forth the suggestion that the Leopard programme should be expanded in place of the costly and still not altogether certain German-American-MBT-70-project, and that this already proven German standard tank should be adopted as successor to the obsolescent M-48 A2. This view has been frequently expressed in competent circles during the past few months. Considerations of cost effectiveness play a predominant role. At the same time, the possibility of certain future tactical and strategic changes is underlined. (Abstract supplied, modified)

1302
Getler, Michael. NAVY'S LFSS LOOMS AS HEIR TO BATTLESHIP. Technology week, v. 20, May 22, 1967: 14-15. UG630.M54, v. 20

Describes the Navy's new Landing Force Support Ship [LFSS], which will be operational by 1975. The article also details candidates for a weapon system for the LFSS--a Navy version of the 175-mm howitzer, a barrage rocket, and the Sea Lance or an entirely new missile system.

1303
Green, William, comp. THE WORLD GUIDE TO COMBAT PLANES: ONE. New York, Doubleday [1967] 222 p. illus. TL685.3.G735, 1967

Contents. --Guide to air force combat equipment. --The development of fighter aircraft. --Current fighters. --Current attack aircraft. --Avionics for combat aircraft. --Index.

Describes in detail the aircraft and equipment (and the capabilities and shortcomings thereof) of the world's 120 individual air forces and naval air arms.

1304
Gross-Talmon, Paul. [SAAB 37 "VIGGEN." THE FIRST STOL WEAPONS SYSTEM FLIES IN EUROPE] SAAB 37 "Viggen." Das erste STOL-Waffensystem fliegt in Europa. Wehr und Wirtschaft, v. 11, Apr. 10, 1967: 209. illus.
U3.W38, v. 11

Considers a new Swedish STOL-aircraft, SAAB 37 "Viggen," a milestone in the development of airborne weapons systems. The new aircraft is to replace the existing SAAB A32 Lansen in the early, and the SAAB 35 in the late seventies. A short description of the new aircraft's technical and performance characteristics is given.

1305
Kens, Karlheinz. [DEVELOPMENT AND STATUS OF ASW AIRCRAFT] U-Boot-Jäger: Entwicklung und Stand. Flugwelt, v. 19, Mar. 1967: 145-149. illus.
TL503.F626, v. 19

Submarines carrying intercontinental missiles have found their anti-weapon: the ASW aircraft as a maritime long-distance reconnaissance aircraft equipped with special detection equipment and weapons. The author describes the history of anti-submarine warfare, he discusses special aspects of attack submarines, and gives a brief description of the 7 types of ASW aircraft presently in service. (Abstract supplied, modified)

1306
Kleber, Brooks E., and Dale Birdsell. THE CHEMICAL WARFARE SERVICE: CHEMICALS IN COMBAT. Washington, Office of the Chief of Military History, U.S. Army; [for sale by the Superintendent of Documents, U.S. Govt. Print. Off.] 1966. 697 p. illus. (United States Army in World War II: The technical services) D769.A533, v. 6, pt. 7, v. 3
"Bibliographical note": p. [659]-663.

Assesses the activities of the Army's Chemical Warfare Service during World War II. The Service's origins, its organization, and the kinds of weapons that it employed (smoke screens, chemical mortars, flame throwers, incendiary bombs, etc.) are described. In their final chapter Kleber and Birdsell discuss the Service's preparations for gas warfare and the reasons it was never used.

1307
[THE LAUNCHING OF THE FIRST FRENCH ATOMIC SUBMARINE, "REDOUTABLE"] Le lancement du "Redoutable" premier sous-marin francais lanceur d'engins, by F. C. Perspectives, v. 23, May 13, 1967: [item 2] 1-2. HC10.P4, v. 23

Analyzes France's strategic naval defense through discussing the atomic submarine "Redoutable," the first in a new line of submarines that are to become the main task force of the Naval Strategic Force. Equipped with Polaris-type missiles and modern torpedoes, the "Redoutable," which is to be completed by 1970, does not as yet have the firing and detection superiority of British or American submarines. Experimental research is being conducted to equip the "Redoutable" with thermonuclear weapons of more than the present 1-megaton strike power. The author believes that despite its cost the deterrence value of the French Naval Strategic Force will be enhanced with the production of atomic submarines and new defensive weapons, especially in view of the anti-missile system the Russians are currently developing.

1308
Lee, Asher. [AIR FORCE AND NUCLEAR WEAPONS POTENTIAL OF RED CHINA] Luftwaffe und Kernwaffenpotential Rotchinas. Wehrkunde, v. 16, May 1967: 241-243. U3.W396, v. 16

Contends that Red China has "all the requisites" to become a nuclear power of the first rank. Asher thinks that before 1970 Peking will probably start stockpiling thermonuclear weapons. Although China's air-defense system is still primitive, progress seems under way in the aerospace industry, electronics, and ballistic missiles.

1309
Lucien, René. [JOINT DEFENSE AND ARMAMENT IN EUROPE?] Gemeinsame Verteidigung und Rüstung in Europa? Flugwelt, v. 19, Apr. 1967: 207-208. TL503.F626, v. 19

Joint defense politics and appropriate armament are required if Europe shall survive. The problems of European aircraft industries are discussed in connection with this requirement, which the author thinks is a prerequisite of an economically united Europe. Special attention is paid to the relationships between the military and the economic protection of Europe. (Abstract supplied, modified)

1310
McGrath, Thomas D. IS THERE AN ASW GAP? Ordnance, v. 52, July/Aug. 1967: 47-49. UF.O67, v. 52

If current trends in defense planning continue, the U.S. Navy's ability to react to submarine attack will lag considerably behind the offensive capability of its opponents. Political pressures, fund limitations, and demands from operating forces combine to defer or curtail long-term programs. Recently non-Vietnam-oriented research programs have been reduced or postponed in favor of programs directly related to war operations. Requirement of cost effectiveness justifications prior to program development and the reorganization now being implemented within the Navy Department create further delays. The present antisubmarine warfare [ASW] program consists of upgrading existing equipment and increasing its reliability, but it involves little innovation. Unfortunately new developments in submarine technology will make current ASW preparations ineffective. The ability of nuclear submarines to operate without snorkels and to submerge several thousand feet below the surface challenges underwater detection and destruction systems. While some feel the best defense against a nuclear submarine is another submarine, this view presupposes the U.S. submarine's superiority and its availability in sufficient quantity to maintain a favorable exchange ratio. Even if such submarines were available improved detection equipment and weapons-delivery systems would be needed to ensure their effectiveness. No present system, however improved, can provide undersea security; radically new concepts are urgently needed.

1311
Miller, Henry L. NUCLEAR POWER IN THE COMBAT ENVIRONMENT. Shipmate, v. 30, May 1967: 12-15. illus. VA49.S53, v. 30

Describes the advantages in simulated warfare of the nuclear powered ships USS "Enterprise" and "Bainbridge" over conventional oil-burning ships. The author believes that one of the greatest advantages of nuclear-powered ships is that they do not have to depend on oil for fuel. This fact allows for increase in tactical flexibility that enables nuclear ships to travel longer, operate in bad weather, and maintain high speeds thereby reducing their vulnerability to submarine attack. Nuclear power is not only revolutionizing the art of naval warfare but will have a significant effect on our national industrial potential.

1312
Murtaugh, S. A., and H. E. Criel. FUNDAMENTALS OF PROPORTIONAL NAVIGATION. In Institute of Electrical and Electronics Engineers. Spectrum, v. 3, Dec. 1966: 75-85. TK1.I15, v. 3

Describes proportional navigation, a guidance technique in air-to-air and surface-to-air missile systems for interception of airborne targets.

1313
NATO SHIFTS PROCURING PLANS TO MEET MILITARY NEEDS. Aviation week & space technology, v. 86, Mar. 6, 1967: 94-95. TL501.A8, v. 86

Discusses NATO's decision to revamp its procurement procedures in its upcoming 5-year program.

The author notes that the withdrawal of France from the alliance has accelerated this reevaluation. He lists five NATO countries and describes significant actions each has taken in shifting away from alliance-sponsored projects. The Government of Belgium, for example, has decided to defer its decision to participate in a joint Northrop F-5 production program with the Dutch.

1314
Niu, Sien-Chong. CHINA'S MINERAL WEALTH. Ordnance, v. 51, May/June 1967: 587-590. map.
UFl. O67, v. 51

Statistics published in official Chinese Communist reports indicate that China's mineral wealth is very great, although to date it has not all been explored or exploited. Communist data may be unreliable, but it is commonly recognized that China ranks third in the world in coal deposits. In proven reserves of iron ore China also ranks third, after the Soviet Union and India but ahead of France and the United States. On the other hand, much of the ore is of rather poor quality, and the output of the Chinese steel industry is limited. China produced only 10 million tons of steel in 1965 in contrast to the U.S. output of 102 million tons. Low steel production severly limits the nation's war production capabilities. China has great reserves of combustible shales, but its oil production is not very great. Reports in late 1964 suggested China was producing enough oil to meet its domestic requirements, particularly since its industry did not depend much on oil products, but the quality of the oil is inadequate for refining into aviation gasoline. China therefore must depend on the Soviet Union for high-octane fuel. This is a dangerous situation given the present rift between the two nations. Rich uranium deposits discovered in Sinkiang are the major reason for the Moscow-Peking struggle to control the area. China must rely on imported copper, but has ample reserves of manganese, lead, aluminum, tungsten, molybdenum, antimony, mercury, and tin. China has ample "subsidiary" metals for the development of heavy industry and almost all necessary raw materials to produce nuclear weapons and rockets. China's resources are far greater than early Western estimates showed. However, they are concentrated largely in Manchuria and Sinkiang, regions that are highly vulnerable to either Soviet land-or Western sea-attack.

1315
Perret-Gentil, Jacques. [THE STRONGEST WEAPONS SYSTEM] Das starkste Waffensystem, by J. Pergent. Wehrkunde, v. 16, June 1967: 297-301.
U3.W396, v. 16

Suggests that the nuclear-powered, nuclear-armed submarine is the strongest weapons system in existence. It effectively utilizes four elements; sea, air (missiles), space (navigation satellites), and land (targets). Its slow consumption of propellant and the "implosion efficacy" of its weapon (the nuclear warhead) represent optimal utilization of nuclear technology by a weapons system.

1316
Peterson, L.C. VINDICATION OF THE SAM. Ordnance, v. 51, May/June 1967: 583-586. illus.
UFl. O67, v. 51

Even when the North Vietnamese surface-to-air [SAM] missiles remain unfired or miss their targets, their deployment is justified. Their presence denies the United States airspace over prime North Vietnamese target areas, and forces U.S. aircraft to fly at lower altitudes, making them more vulnerable to conventional ground fire and increasing their fuel consumption. Bombers flying over enemy territory without SAM missiles can remain at high altitudes and use the complicated bomb-nav systems that are very accurate at high altitudes but tend to have trouble at lower altitudes, where their radar range is restricted and their scopes are cluttered. Evasive action against missiles is easier at lower altitudes, but there the problem of conventional anti-aircraft weapons increases. To date the U.S. planes destroyed have been far more costly than the SAM's expended. Although according to recent figures the Communists needed more than 300 missiles to shoot down 14 U.S. aircraft, this means that $9 million in missiles destroyed a minimum of $14 million in planes. A similar comparison between anti-aircraft costs and planes lost is possible. In addition, the SAM's currently being used in Vietnam are almost obsolete; it is frightening to think of the damage North Vietnam could inflict with more advanced weapons. U.S. military planners must consider the Vietnam experience in planning for the future security of the Nation.

1317
Possony, Stefan T. SCRAG: THE WEAPON OF THE WORLD REVOLUTION. In American Security Council. Washington report, May 29, 1967: 1-4.
P&GP RR

American strategists have argued against space weapons as more expensive, less accurate, and less useful than intercontinental ballistic missiles [ICBM's], which they claim space weapons were designed to replace. As usual, while the United States delayed, the Soviet Union pushed forward, and in 1965 it announced the development of a "three-stage triple-in-one Soviet weapon code-named 'Scrag'" for use as either a normal ICBM, a space bomb, or a fractional orbital weapon. When Scrag is used as an ICBM it can carry a 50-megaton warhead. It can carry 30 megatons in orbit, and can be fitted for delivery of multiple warheads. In firepower one orbital Scrag equals 20-30 Minuteman missiles, and one ICBM Scrag, 50 Minuteman missiles. The United States ratified a space treaty in spite of this new Soviet development, although the treaty provides no defense whatsoever against Scrag or other space weapons. Scrag gives the Soviets the capability to hit any target on earth with multiple warheads effective against both hardened and soft installations. Orbital bombs provide a strategic reserve for the U.S.S.R. in the event of a long nuclear war, and are invulnerable as long as the United States has no defenses against space weapons. Scrag's invulnerability and blackmail potential enhance the Soviet Union's effectiveness in psychological warfare. It strengthens the Soviet "physical nuclear strategy" and can deter or prevent counterstrikes and retaliation. By leaving the United States with a choice between self-destruction or surrender, Scrag may facilitiate the Soviet aim of world conquest. It presents a threat that the United States is totally unprepared to meet.

1318
PROPOSALS DUE ON SEABORNE ABM SYSTEM. Aviation week & space technology, v. 87, July 17, 1967: 43, 45. illus.
TL501. A8, v. 87

Investigates a new concept in mobile missile defense--the "Seaborne Anti-Ballistic Missile Intercept System" [SABMIS]. Companies have already been selected to submit proposals, and a 6-month study indicates that the concept is compatible with existing technology. The chief advantage of the system, mobility, will protect it from enemy ICBM's. The author notes that the deployment of SABMIS would require the enemy to build a new set of defensive and offensive systems.

1319
Prow, John W. WHAT OF SOVIET ARMOR? Ordnance, v. 51, Mar./Apr. 1967: 485-489.
UF1.O67, v. 51

Describes the weight, range, speed, and other characteristics of Soviet armored cars, light, medium, and heavy tanks, and self-propelled guns. Soviet armor is designed to operate in the vastness and adverse weather conditions of Russia. Prow finds the Soviet tanks superior to Western models in number, speed, and agility, but he feels the Western tank guns have more accuracy, a higher rate of fire, longer range, and greater penetration power.

1320
Reich, Peter, and Victor W. Sidel. NAPALM. New England journal of medicine, v. 277, July 13, 1967: 86-88. R11.B7, v. 277

Describes for the physician the properties and medical consequences of napalm, the gasoline gel used with enormous success as an incendiary weapon. In incendiary bombs, fire bombs, land mines, and flame throwers, napalm is capable of causing severe and painful individual injuries and mass casualties potentially as extensive as those from nuclear weapons.

1321
Rodberg, Leonard S. ABM--SOME ARMS CONTROL ISSUES. Bulletin of the atomic scientists, v. 23, June 1967: 16-20. TK9145.A84, v. 23

The deployment of an antiballistic missile [ABM] system by the United States would drastically alter the present Soviet-U.S. strategic balance and result in a classic "offense-defense" arms race. ABM deployment would spur an offensive buildup by both sides because of the imperfections inherent in any defense system and the need to increase counteroffensive penetration capabilities. Already the presence of a Soviet ABM system is causing the United States to beef up its offensive forces (e.g., the development of the advanced missile Poseidon and the fitting of multiple warheads on Minuteman missiles). Politically, ABM deployment would strain relations between the United States and the Soviet Union and increase international tensions by shifting the strategic balance. In addition, the ABM makes a Russian first strike more attractive, since its ABM system would be more effective against an uncoordinated U.S. second strike. Any agreement limiting ABM's could be informal and private. Yet even an informal agreement does not seem politically feasible. Soviet leaders could not accept a treaty that deals with defensive missiles exclusively; they would demand "parity." Nor could American leaders explain a reduction in ICBM strength without a formal international treaty. Soviet leaders may, however, accept a freeze on launchers. This would require no inspection, but a limitation on offensive weapons and launchers would be guaranteed thereby. The American public must be convinced that the development of a Soviet ABM system does not demand a response in kind.

1322
Schrader, Rudolf. [RECONSTRUCTION OF GERMAN DEFENSE RESEARCH] Der Wiederaufbau der deutschen Verteidigungsforschung. Aussenpolitik, v. 18, July 1967: 409-421. D839.A885, v. 18

Details West Germany's defense research effort. Schrader underlines Germany's great tradition in that work, and considers various research establishments and fields of inquiry (e.g., Aerodynamical Research Establishment; radar research; defense psychology; "anthropotechnic"). Multilateral and bilateral research projects, such as West German cooperation in NATO's defense research, or French-German defense research institute Saint-Louis are also discussed.

1323
SCRAG. Destiny, v. 38, no. 6, 1967: 103-104.
DS131.A1D4, v. 38

According to an article in the June 17, 1967, issue of the Manchester Union Leader (Manchester, N.H.) the Soviet Union has developed a new three-in-one weapon that can be used as a normal intercontinental ballistic missile [ICBM], as a space bomb, or as a fractional orbital weapon. Its code name is Scrag. Scrag in orbit equals 20 to 30 minuteman missiles and as an ICBM, 5 Titan II or 50 Minuteman missiles. It provides the Soviets with the capability to hit any spot on earth at short notice. The newly signed treaty banning weapons of mass destruction in outer space does not protect the United States from this weapon. Scrag can be fitted with single or multiple warheads and used in serial or individual attacks. Orbital Scrags, through explosions at high altitudes, can keep U.S. electronics and communications inoperable and thus hinder U.S. retaliatory forces. This new weapon will allow the Soviets to intervene in local crises or threaten any nation opposed to the Communist position. It is a threat to the very survival of the Nation.

1324
Shannon, J. SPIW: WEAPON OF THE FUTURE? An Cosantoir; Irish defense journal, v. 27, Apr. 1967: 200-202 U1.C8, v. 27
"Reprinted . . . from 'Australian Army Journal.'"
U1.A92

Describes the Special Purpose Individual Weapon [SPIW] and compares four test models. Tests show that the dart-firing rifle was deadly, but mechanical difficulties made it impractical.

1325
SOVIETS MAY UNVEIL ADVANCES IN ICBMs. Aviation week & space technology, v. 86, Mar. 6, 1967: 108-110, 112-113. illus. TL501.A8, v. 86

Despite their "traditional funding bias toward defensive systems" the Russians are expected to produce a new generation of offensive missiles this year. The first prototypes of these offensive weapons will be Scrag, a three-stage intercontinental ballistic missile with a multiple warhead, and Serb, a solid-propellant

ballistic missile capable of being launched from a submerged submarine. Since last year the Russians have increased their ICBM stockpile by 115 missiles. However, the Soviets are known to possess over 725 intermediate ballistic missiles, giving them a decided advantage over U.S. IRBM stockpiles. Present Soviet leaders are maintaining a high level of military spending; the result has been a domestic "brain drain," with scientists and engineers being channelled into military and space programs.

1326
Taylor, Hal, and K. Voss. PLANS FOR FOUR NEW MISSILES PACE EXPECTED FUNDING CLIMB. Technology week, v. 20, Mar. 27, 1967: 101-102, 105. illus.
UG603.M54, v. 20

Examines the four new missiles that the Department of Defense is planning to build to increase the offensive and defensive capability of U.S. military aircraft in the mid-1970's. These include two Navy-Air Force air-to-air missiles, a general purpose antitank missile, and an Air Force air-to-ground weapons system. The authors examine and evaluate plans for developing new bombs, especially bomblets--antipersonnel bombs that are dropped in large numbers in a wide pattern that enables them to cover a large area.

1327
Taylor, John W. R. SOVIET AIR POWER. NATO's fifteen nations, v. 12, June/July 1967: 16-23. illus.
UA646.F5, v. 12

Examines the progress the Soviet Air Force has made in tactical and strategic weapons since World War II. Because of its intercontinental ballistic missile system Russia has no real need for strategic bombers because its Air Force is geared primarily to the development and use of tactical weapons. The weapons that the Soviets have supplied to the air forces of 20 or more countries are of the kind that are best suited to local, nonnuclear warfare. The primary weapon of Russia's tactical Air Force is the Su-7B which is able to attain a maximum speed of Mach 1.6. The Soviet Union's newest and deadiest planes are the Yakovlev twin-jet long-range fighter and the Tupolev supersonic bomber. The author believes that the Soviet Air Force "must still be regarded as a highly potent tactical force, even if its strategic role has passed to the long range rocket Forces."

1328
Thomas, B. K. U.S. PLANS LONG-TERM TACTICAL BUILDUP. Aviation week & space technology, v. 86, Mar. 6, 1967: 75-81. illus.
TL501.A8, v. 86

Describes the U.S. tactical-buildup program, including detailed surveys of over 10 different tactical aircraft. Particular attention is paid to the Ling-Temco-Vought A-7, which after its completion will assume the primary attack role for both the Army and Navy and become the backbone of the U.S. tactical Air Force. However, because it is not suitable for combat in areas with significant air opposition, the A-7 will give way to the FX air superiority fighter. Thomas feels that this tactical-weapon surge results from a lack of tactical planning since the end of the Korean War.

1329
TIMETABLE OF DANGER--WHAT CHINA CAN HIT WITH THE H-BOMB. U.S. news & world report, v. 63, July 3, 1967: 35-37.
JKI.U65, v. 63

The rapid nuclear achievements of Communist China place her in a position of ever-increasing world power. If Communist China continues at its present rate to stockpile H-bombs and produce missile-carrying submarines, jet bombers, and short-range missiles and to exploit her potential for producing intercontinental ballistic missiles, it will be a top-ranking nuclear power by 1972-1975. Reacting to this threat, U.S. experts are urging that a "thin" missile defense system against China be operational by 1972 and discussing shifting the strength of the U.S. deterrent in Asia from fixed positions to less vulnerable areas in the air and on the sea.

1330
U.S. Atomic Energy Commission. DIRECTORY OF USAEC SPECIALIZED INFORMATION AND DATA CENTERS. [Oak Ridge, Tenn., 1966] 1 v. (unpaged)
QC772.4.U5

Lists centers, their sponsors, the years started, and the size of their staffs, their scope, services, and qualified users.

1331
U.S. Congress. House. Committee on Foreign Affairs. STAFF MEMORANDUM ON CURRENT STATUS OF THE ANTI-BALLISTIC MISSILE (ABM) PROGRAM. Washington, U.S. Govt. Print. Off., 1967. 7 p.
UG633.A412, 1967

Background material on the current status of the antiballistic missile program, including information on U.S. and Soviet offensive and defensive nuclear capabilities, Communist China's nuclear program, and the major issues concerning U.S. development and deployment of an antimissile defensive system.

1332
WEAPONS AND WORLD STABILITY [editorial] Aviation week & space technology, v. 86, Mar. 27, 1967: 11.
TL501.A8

Excerpts from an address by Dr. Harold Agnew, Weapons Division leader at the Atomic Energy Commission's Los Alamos Laboratory. Dr. Agnew reiterates that the United States must maintain its military superiority at all costs. The new emphasis on weapons that contribute to stability rather than to superiority represents an undesirable change in the balance-of-power concept. The United States is at fault if it does not use its full technological abilities to its best advantage.

1333
Wiesner, Jerome B. THE COLD WAR IS DEAD, BUT THE ARMS RACE RUMBLES ON. Bulletin of the atomic scientists, v. 23, June 1967: 6-9.
TK9145.A84, v. 23

Although recent U.S.-Soviet negotiations and agreements indicate the cold war is dead, the arms race continues, with strong forces in both countries acting

to intensify it. In the United States Congressmen, military leaders, and scientists who advocate deploying an antiballistic missile [ABM] system contribute to the arms race, for deployment would only lead to further escalation. Not only would a U.S. ABM system stimulate the Russians to develop more sophisticated offensive weapons, but the system itself would cost an estimated $50 billion. ABM deployment would preclude any hope for successful limitation of arms and would divert attention from constructive domestic and international alternatives. Unfortunately proponents of antiballistic missile defenses are not countered by equally "well-informed and dedicated spokesmen to present the reasons for not procuring a new weapons system." These same proponents advocated construction of the B-70 and Nike-Zeus, along with other potentially "defensive" weapons. The Nike-Zeus would have provided no protection; the B-70 was an inadequate bomber. The cancellation of these projects in the face of great pressure from the "military-industrial complex" provides a worthy precedent that should be examined before deploying an ABM system.

1334
Yaffee, Michael L. FRENCH LAND, SEA MISSILE FORCES DEVELOPING RAPIDLY. Aviation week & space technology, v. 86, May 29, 1967: 113, 115, 117. illus. TL501.A8, v. 86

Describes the French submarine-launched missile M112 and the surface-to-surface missile S112, newest and most powerful missiles in France's strategic strike force. Both missiles use the same composite solid propellant combination, but the S112, with a longer range (2,220 miles), is more advanced. The M112, which will be developed into a two-stage missile, is being used on the Gymnote, a conventionally powered submarine designed specifically for the test launching of Navy missiles. These missiles will be operational in 1970, and the M112 will be carried by Redoutable-class nuclear submarines, scheduled for operation during the same period.

C. NATIONAL SECURITY POLICIES AND MILITARY STRATEGIES

1335
[THE AMERICAN NUCLEAR UMBRELLA] Le Parapluie nucléaire américain. Perspectives, v. 23, June 24, 1967: [item 5] 1-6. HC10.P4, v. 23

Despite increasing fears and doubts about the viability of NATO's "flexible response" strategy on the part of the Europeans, political and military leaders from both sides of the Atlantic are endeavoring to establish a meaningful integration of nuclear and strategic planning. The Multilateral Force [MLF] and the Atlantic Nuclear Force [ANF], which incorporated proposals of nuclear sharing and mutual strategic responsibility, are examples of abortive measures for Atlantic cooperation. Although these efforts failed, the United States has established a committee on a ministerial level, the NDAC [Nuclear Defense Affairs Committee], and a subcommittee, the NPG [Nuclear Planning Group], for nuclear planning and defense. These committees exchange nuclear information and discuss nuclear policy questions pertaining to NATO. In particular, they have created a system of communication that accelerates consultation on strategic problems between different levels of authority. Today the United States is increasing its efforts to restore Europe's faith in its NATO nuclear defense strategy. It is quickly realizing that its "lone-hand" policy, which has created a "credibility gap," serves only to damage U.S.-European political and military relations.

1336
Amme, Carl H. NATO STRATEGY AND FLEXIBLE RESPONSE. In United States Naval Institute, Annapolis. Proceedings, v. 93, May 1967: 58-69. V1.U8, v. 93

The American concept of the defense of Western Europe is incompatible with Europe's strategic concept of its own security and survival. While Western Europeans believe in the strategic concept of deterrence, American military tacticians are planning a limited-war strategy based on conventional methods to protect Western Europe. Two features incorporated into this flexible-response program are the "additional option" and "controlled response" concepts. Both suggest a nuclear deterrence strategy proportionate to the levels of enemy response and escalation. This strategy can be successful "so long as the threat is made to appear to the opponent commensurate with the vital interests of the nation making the threat." The success of the Berlin Wall as a modest objective of the enemy was the result of a nuclear strategy that was not commensurate with nonvital goals. Defending nonvital objectives would require NATO force posture that could strike quickly and effectively against enemy "probes." Miscalculation of NATO resolve and "probes" could engender conflict contingencies within the scope of American nuclear strategy. But if strategic concepts--of lower violence thresholds, "firebreaks," and the establishment of violence thresholds at intermediate stages between the first use of nuclear weapons and general war--are inculcated into the American response strategy, the credibility of unambiguous American nuclear commitments and deterrence would be restored among the NATO allies.

1337
Antic, Zdenko. [NEW CONCEPTS OF YUGOSLAVIA'S LAND DEFENSE: ADAPTATION TO CONDITIONS OF A NUCLEAR WAR AND A MULTINATION STATE] Neue Konzeptionen der Landesverteidigung Jugoslawiens. Umstellung auf Bedingungen des Atomkrieges und des Vielvolker-Staates. Wehrkunde, v. 16, June 1967: 303-306. U3.W396, v. 16

Reviews Yugoslavia's current defense doctrine, which provides for guerrilla-type warfare against the enemy after an invasion supported by nuclear attack. Antic reviews the historical background of the nation's military posture.

1338
Bell, Coral. ASIAN CRISES AND AUSTRALIAN SECURITY. World today, v. 23, Feb. 1967: 80-88. D410.W63

Changes that have taken place over the past few years in Australian foreign and defense policy can be characterized as "the substitution of new complexities for old simplicities, or of policies governed by concepts of regional threat and interest for policies which rest on assumptions about the central balance of power." Although historically the

Australians have always identified their security and defense objectives with British objectives in the East and West, the aftermath of World War II has placed a priority on their policies being more closely aligned with those of the United States in its efforts to contain the Communist threat in Asia. This is a result of a "threat-perception" regionalism that has placed Australia, regionally and strategically, in the Asian category. The degree to which Australia identifies its security and defense objectives with those of the United States is evident in its policy concerning Vietnam--Australia has committed over 5,000 troops in that war. Because of Australia's vulnerability to outside attack, it relies heavily on a foreign policy that integrates its security with the defense perimeter of another great power--the United States. Australian policymakers should keep in mind that while the United States and their country have parallel interests in specific areas in the world, there are divergencies which must be defined to indicate the limits and conditions of success for an Australian security policy.

1339
Bellinger, Frederick. PROBLEMS OF CIVIL DEFENSE. Ordnance, v. 51, Mar./Apr. 1967: 508-510.
UF1.O67, v. 51

As responsibility for the civil defense program is shifted from one place to another within the Federal bureaucracy, officials continue to extol the program's importance justifying each change as intended to improve its administration. Statements by the Defense Department, Presidents Kennedy and Johnson, and other key Government officials have continually stressed the importance of civil defense, but Congress has shown little enthusiasm. For every dollar of defense expenditures less than one-fifth of a cent has been appropriated for civil defense. However, recent statements by Defense Secretary McNamara and the Joint Chiefs of Staff, which term a fallout-shelter program an essential accompaniment to antiballistic missile deployment, have raised some interest in civil defense. Defenses against chemical and biological attack are also part of a comprehensive civil defense program, although little has been done in this area beyond the research stage. Opponents of civil defense contend such a program will be considered provocative by U.S. enemies; proponents see it as an important part of a sound deterrent posture.

1340
Booth, Leon. MISSILES AND ASTRONAUTICS. Ordnance, v. 51, Mar./Apr. 1967: 445, 448, 450.
UF1.O67, v. 51

The decision whether or not to deploy antiballistic missiles [ABM] is one of the most difficult any President has ever faced. At stake is an expenditure of $30-$40 billion, which could save from 70-100 million American lives but would leave America's NATO and SEATO allies vulnerable. At present it is estimated that 120-140 million Americans would be killed in a surprise Russian attack, for the highly concentrated U.S. urban areas offer the attackers lucrative targets. The Soviet Union, which does not offer such a target, has a 2-year lead in ABM deployment and is rapidly narrowing the U.S. lead in offensive weapons and penetration devices. Since 1955 the Army has been pushing missile defense, but Defense Secretary McNamara postponed any decision on ABM deployment. The Nike-X system demonstrates tremendous technological breakthroughs in electronics and propellants, such as a multifunction array radar, a missile-site radar, the Zeus and Sprint missiles, and "one of the most fantastic and elaborate electronic information systems ever designed." Nike-X would be useless, however, without shelters to protect the population from the fallout from its own defense missiles. Some experts feel that underground shelters stocked with survival supplies could save more lives than a Nike-X system deployed around major cities. While the civil defense program provides some shelter protection against fallout, the Government decided long ago that shelters against heat and blast effects are too expensive. A full-scale fallout shelter system could undoubtedly lower U.S. fatalities, but in the event of surprise attack the number of Americans able to reach them is questionable.

1341
Bower, Robert J. MILITARY OBJECTIVES IN THE NUCLEAR AGE. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 46, May 1966: 91-97.
Z6723.U35, v. 46

In this nuclear age because of the enormous destructive potential of warfare, military operations must be subordinated to national political objectives. Political leaders bear responsibility for clearly defining and enforcing national limited-war aims since military leaders cannot be expected to limit their own operations. War objectives should be selected on the premise that "the role of military power in our world is essentially a political one." Armed forces serve either as a balancing factor in diplomatic negotiations or as a means to reach a political goal that cannot be reached by peaceful means. In order to provide effective political leadership of military operations, civilian planners must carefully relate the tactical capabilities of the military to political objectives. In the past Americans have often failed to recognize that it is in the national interest for political objectives to limit war. With the introduction of nuclear weapons, this victory-oriented attitude, aimed at totally disabling the enemy, must be abandoned in favor of matching minimum acceptable political objectives with the necessary military force. Although the United States should not fail to meet a military challenge, wartime objectives should be determined by weighing political advantage against military costs and risks whenever possible.

1342
Bratton, Joseph K. REGIONAL WAR STRATEGY IN THE 1970's. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, July 1967: 3-10. Z6723.U35, v. 47

In the next decade international instabilities that result from aggressive nationalism, regional upheavals, population expansion, and nuclear proliferation will be fostered by the Communists, who will pursue a policy based on revolution and guerrilla warfare. If Communist strategy should be successful, "the United States would be confronted with two or more concurrent limited wars" in widely separated regions. The problems associated with those wars would be enormous. Active duty forces would need reenforcement by general purpose reserve forces capable of rapid logistic support,

and stationed at overseas bases so that they could respond instantly to regional conflagrations. The strategic importance of rapid military response is such that it would be difficult for the United States to carry out limited wars without an adequate base infrastructure. This could be provided by regional alliances, in which indigenous allied forces would be trained and equipped by the United States and help maintain stability in the area by supporting their local governments. The U.S. strategy of supporting regional alliances and forward deployment of forces must be accompanied by clear and definitive concepts of national security interests and objectives. In some areas regional war should be ruled out. In others, preservation of the status quo would maintain U.S. strategic interests without affecting or violating them. In a regional war, U.S. objectives must be set at careful levels so as not to exceed the enemy's escalation threshold. Regional warfare "with its inherent threat of escalation to general war, should not be accepted except to preserve or attain those vital interests."

1343
BRITAIN TO STRESS NATO ROLE, MOBILITY IN MILITARY DEPLOYMENT. Aviation week & space technology, v. 87, July 24, 1967: 28.
TL501.A8, v. 87

Facing cutbacks in defense spending, British military forces are reorganizing. Britain is recalling the majority of its troops based outside Europe but will continue to provide equipment and training for allied forces. Future defense policies will emphasize Britain's commitments to NATO and will be backed by armed forces equipped for swift deployment from the British Isles.

1344
THE CHINESE H-BOMB [editorial] Nation, v. 205, July 3, 1967: 4. AP2.N2, v. 205

China's scientific achievement in exploding a hydrogen bomb only 3 years after its first atomic detonation is remarkable. France, by comparison, set off its first atomic bomb in 1960 and has yet to develop a hydrogen bomb, although France has been a significant scientific and industrial power for many years. While a few of China's scientists have studied in the United States, this factor alone does not explain their success. Success in the nuclear field depends on "inspired leadership coupled with a broadly based engineering community and the ability to translate scientific insight into industrial reality." The Chinese weapon can eventually be reproduced in quantity and improved in yield relative to weight, an important military and diplomatic consideration. If the United States invades North Vietnam and China counters with its own land forces, China would not be as vulnerable to U.S. nuclear retaliation today as U.S. strategists have assumed, if Peking possesses even short-range delivery vehicles for its nuclear devices. By the end of 1968 China should have about 50 medium-range nuclear-tipped missiles for use against the Soviet Union and hydrogen bombs that can threaten the U.S. mainland. The Chinese insistence that their nuclear weapons are purely defensive seems plausible enough, for it is hard to see how an aggressive nuclear policy would be in their interest. The threat to world peace comes not from China, but from the U.S. determination to "maintain a military position on the Chinese borders."

1345
Chuikov, Vasilii I. NUCLEAR DEFENSE: WHILE U.S. LAGS, SOVIETS RUSH AHEAD. U.S. news & world report, v. 63, July 31, 1967: 61.
JK1.U65, v. 63

Excerpts from Marshal Chuikov's recent article in Izvestiia. Slav Rm

Missiles and nuclear weapons have greatly complicated the problems of civil defense in the Soviet Union. Although Soviet military doctrine calls for defense based on missile forces, antiballistic missiles, and interceptors, nevertheless the population must be protected from the consequences of any enemy nuclear blows. The winner of a nuclear-missile war is the nation whose population survives. To this end the state has carried out research on blast and fallout shelters and analyzed the distribution of the population and production facilities so as to minimize the disruption of economy and society that would be caused by nuclear war. Universal training of the population has also been introduced, for everyone from school-age up must know how to conduct themselves in the event of nuclear or chemical-bacteriological attack. As the defensive power of the Soviet Union is strengthened, so the world is increasingly safe from the devastation of thermonuclear war.

1346
Clavier, Philippe A. SOVIET NUCLEAR DEFENSE POLICY. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, Jan. 1967: 72-77. Z6723.U35, v. 47

The Soviet antiballistic missile defense system [ABM] may not have been deployed to withstand an American attack, but rather to protect specific population samples (nodules). These nodules could recover rapidly after a total holocaust, colonize the rest of the world, and perpetuate communism. Since they would be located in hidden, inaccessible areas (the mountains of Tashkent or Siberia), an interception defense system protecting the nodules could reduce the effectiveness of strategic offensive weapons penetration capability. Consequently U.S. offensive capabilities, based on "penetration exhaustion," would have their limitations against this type of defense system. The number of long-range missiles that cross the defensive interception path of a nodule would be few in proportion to those attacking populous locations. Should there be an increase in enemy missiles in the "threat tube," the defense would only have to fire a few more interceptors. Caves and tunnels would provide protection for the nodules. Other defenses could include determination of the locations of enemy ships and their destruction and the use of nuclear explosions to fill the Strait of Gibraltar or the Bab el Mandeb to close strategic areas to fleet activity--one reason for the Soviet Union's interest in the Middle East.

1347
Cook, Don. DOES NATO HAVE A FUTURE? Reader's digest, v. 90, Apr. 1967: 132-137.
AP2.R255, v. 90

General de Gaulle has insisted on the multimillion-dollar removal of U.S. military equipment and personnel from French soil as well as the transfer of NATO

headquarters from Paris to Brussels. He fears commitments which would involve France in conflicts it wishes to avoid and also contends that the current trend toward detente eliminates the need for the NATO military structure. France will remain a member of NATO for the next few years thereby retaining its protection, but De Gaulle's statement that French forces will respond only to "unprovoked aggression" has caused uncertainty over the French course of action in case of any future European military confrontations. NATO will not be dismantled in response to the uncooperative attitude of France and the easing of East-West tensions, but will be modified to serve as a "safety net for all its members."

1348
Cousins, Norman. CHINA AND THE HYDROGEN BOMB. Saturday review, v. 50, July 8, 1967: 16.
Z1219.S25, v. 50

Admission by Washington officials that the recent advances in Chinese nuclear capacity were not expected this soon indicates a serious miscalculation. China now has the power to destroy large portions of the United States, or to increase the world's potential for nuclear war by distributing nuclear weapons to Nasser or Castro. The United States has not even tried to engage China in serious talks to head off the arms race. Perhaps Government officials consider discourse with China politically hazardous. Agreements to slow the arms race favor proponents of security through control of force rather than through acquisition of force. This is a course many officials are unwilling to espouse openly. The Government deceived the American public after Hiroshima, just as it has in the case of the Chinese nuclear capacity, when it assured the public that the U.S. nuclear monopoly could not be broken for 20 years. At that time, scientists had implored the President not to use atomic weapons in Japan, stressing that to prevent an unlimited atomic arms race, the United States must press for world control "against the background of its own restraint." Theologians and philosophers seem better equipped than politicians to deal with today's national security problems, for they recognize the value of restraint and that some things are gained when others are relinquished. Democracy's tragic flaw may be politicians who allow "immediates" to crowd out the "ultimates." America needs men willing to sustain short term defeats in their pursuit of a long-term goal.

1349
Crosby, H. Ashton. THE CASE FOR ANTI-BALLISTIC MISSILES. In United States Naval Institute, Annapolis, Proceedings, v. 93, July 1967: 26-31. illus.
VI.U8, v. 93

The arguments against U.S. deployment of an anti-ballistic missile [ABM] system are not convincing. ABM deployment would not cause the Soviet Union to believe that nuclear war is imminent, nor would it accelerate the arms race if a freeze on offensive weapons were negotiated. This freeze would enable the Great Powers to increase their defensive capabilities, thus further reducing the risk of war. Although the cost of an ABM system is astronomical, the same amount is spent on foreign aid, and the ABM would save 75 million lives. The Soviet ABM system is not ineffective, as some military strategists are led to believe. The Russians would not spend a lot of money for something that did not work. Coincidentally the U.S. ABM program offers promise of a highly effective defense in case of a Chinese nuclear attack.

1350
Czako, Stephen A. ATLANTIC 'REQUIEM.' NATO's fifteen nations, v. 12, Feb./Mar. 1967: 53-56.
UA646.F5, v. 12

Although France has threatened the unity and solidarity of NATO, the Atlantic alliance is not breaking up but rather is seeking remedial procedures to adjust to the crisis. When he assumed leadership of the Fifth Republic of France in 1958, General De Gaulle began questioning the benefits to French security from an alliance structured to suit postwar conditions. He unsuccessfully proposed an Anglo-French-American political superstructure to determine major policy decisions in NATO and decided last March to withdraw French military forces from the united command as well as demand the removal of NATO headquarters and the military facilities of its members from French soil. The tremendous financial cost to NATO and the strategic loss to the alliance of dislocating the geographical base of its early warning defense system, as well as uncooperative French attitudes toward overflight privileges and use of oil lines, evoked severe criticism of France by the other 14 members. However, the 14 allies were interested in dramatizing NATO's internal difficulties as little as possible and exercised diplomatic moderation toward France by allowing it continued inclusion in the NATO early warning system. NATO has suffered from its highly publicized troubles but will work out a solution for its survival.

1351
Dalyell, Tam. AUSTRALIA AND BRITISH ARMS. Eastern world, v. 21, May/June 1967: 9.
DS501.E45, v. 21

A close military relationship between Australia and Great Britain while the latter pursues its objectives in an "East of Suez" policy would have a deleterious effect on the relationships between Australia and its Asian neighbors. The Australian government supports a British base in the Far East and is strongly contesting any British evacuation from Singapore, but because of recent events in Asia the prospect of better relations between Australia and Asia depends on whether the Australians can avoid giving Asians the impression that they feel they need to be defended by the British. However British arms are not needed for the defense of Australia--the notion that certain Asian countries, in the midst of their economic difficulties, would launch an offensive against Australia is ludicrous. Indeed, if any country deems it necessary to protect Australian security it will be the United States, already deeply involved in the question of Asian security. Thus, in order for Britain and Australia to maintain a valid pivot for a common "East of Suez" policy they must develop closer economic and technological instead of military relationships.

1352
Destefanis, Lieutenant-Colonel. [NUCLEAR EXPERIMENTS IN THE PACIFIC] Les expérimentations nucléaires dans le pacifique. Revue de défense nationale, v. 23, July 1967: 1209-1214.
D410.R45, v. 23

Examines the radiation effects of the 1966 French nuclear tests in the Pacific. The author notes that the results of nuclear explosions in the air (as opposed to those detonated from a platform) showed little contamination of the surrounding water and an absence of appreciable fallout at medium distances.

1353
Eaker, Ira C. U.S. DEFENSE POLICY. Ordnance, v. 51, May/June 1967: 579-582. illus.
UFl. O67, v. 51

In 1966 the Soviet Union continued to be the major threat to U.S. security. Congressional hearings revealed that the Russians have nearly four million men under arms, approximately 10,000 aircraft, 200 or more land-based intercontinental ballistic missiles, and 400 submarines (many capable of discharging nuclear warheads). The emergence of China as a nuclear power is also cause for concern. U.S. defense policy aims primarily at containing the growing threat of Communist expansion. Twelve events and decisions during 1966 have profoundly affected this policy: continued determination to aid South Vietnam; reorientation of our commitments in Europe due to changes in NATO and increasing involvement in Asia; inability to agree on supplying nuclear weapons to our allies; acceleration of U.S. unilateral disarmament initiatives; rejection of the proposal to use National Guard and Reserve forces in Vietnam; continued failure to provide civil defense facilities; emphasis on tactical air forces to support ground troops; expensive use of airlifts in support of military operations; use of helicopters to increase mobility of ground forces; continued domination of the individual services by the Defense Department; buildup of the Army with reductions in the other services, reflecting preparations for wars of national liberation rather than nuclear exchange; and centralization of defense decisionmaking in the Office of the Secretary of Defense. The new strategy used in Vietnam--the graduated response--has proven a failure, as has the decision to fight a land war and to use our vastly superior air and naval forces in a support role only. However, in spite of the restrictions placed upon their operations by political considerations, U.S. servicemen in Vietnam are again proving their superiority as fighting men.

1354
Einaudi, Luigi, and Herbert Goldhamer. AN ANNOTATED BIBLIOGRAPHY OF LATIN AMERICAN MILITARY JOURNALS. Santa Monica, Rand Corp., 1965. 84 p. (Rand Corporation. Memorandum RM-4890-RC)
Q180. AlR36, no. 4890

Contains a country-by-country listing of current Latin American military journals. The authors find the journals more valuable as a source for the study and understanding of the military factor in Latin America than as a contribution to technical military literature.

1355
Eliot, George F. A NEW LOOK AT DEFENSE. Ordnance, v. 52, July/Aug. 1967: 43-46.
UFl. O67, v. 52

Every American war since 1898 has been followed by a review of the military establishment to correct defects revealed by the war experience; Vietnam is unlikely to be an exception. Throughout history the Nation has agreed that "only the President can define the aims and design the strategy of a war." He cannot safely share this authority or exercise it through a civilian subordinate, but must have direct access to the heads of land and naval operations. Throughout its 20-year history the Defense Department has steadily grown in size and authority, at the expense of the services. An "orderly organization chart," while simplifying the work of the Secretary of Defense by presenting him with a single decision by the Chief of Staff, eliminates the traditional checks and balances that previously protected the autonomy of the services. The sole reason for the existence of a Department of Defense is to prepare for war--and readiness requires decentralized power specifically organized to that end.

1356
Fisher, Ernest F. A STRATEGY OF FLEXIBLE RESPONSE. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, Mar. 1967: 41-55. Z6723. U35, v. 47

Today U.S. military strategy permits a flexible response to any challenge of U.S. interests around the world, backed by an Army organization capable of adapting to any situation. No longer does the United States rely entirely on John Foster Dulles' policy of massive nuclear retaliation against Communist aggression. Critics of Dulles' policy pointed out that the possible failure of the deterrent would lead to self-annihilation, and they indicated the need to provide policymakers with forces capable of waging limited conflicts. From his appointment as Army Chief of Staff in 1953 to his resignation in 1955, Gen. Matthew B. Ridgeway fought vainly for the creation of a more flexible fighting unit to meet U.S. global obligations in order to avoid unnecessary devastation. His successor, Gen. Maxwell Taylor, wrote a paper entitled "A National Military Program," which provided the first definite outline of what became known as the strategy of flexible defense. Although initially opposed by Admiral Radford, Chairman of the Joint Chiefs of Staff, by 1960 General Taylor's proposal to prepare the Armed Forces to deter both general nuclear war and limited war had replaced the concept of massive retaliation. In 1961 the new flexible strategy became associated with the "Reorganization Objective Army Divisions" [ROAD] organizational concept. Now the type of functional battalions composing divisions can be varied to suit the global situation. The new strategy, which includes capabilities to vary the armed response to fit the aggression, will enable the United States to protect its national interest in all situations without resorting to general nuclear war.

1357
[FRANCE HAS CHOSEN THE WEAPON OF FREEDOM: DETERRENCE] La France a choisi l'arme de la liberté: la dissuasion. France demain, no. 2, Dec. 19, 1966: 10-13. AP20. F65, 1966

The European countries, caught between the two nuclear superpowers, must adopt a policy permitting them to defend their independence. This policy must be based on deterrence, a force capable of averting enemy attacks on their vital interests by threat of retaliation. Since 1958 France's defense has been integrated within NATO in the U.S. defense system. In 1963, under completely changed circumstances, General de Gaulle decided to build up France's own deterrent force. In his view thermonuclear deterrence killed the logic of war and replaced it by a logic of terror. The next world war can only be nuclear and will lead to the mutual destruction of the two superpowers. In the face of such enormous danger, it is unlikely that the United States, facing implacable retaliation on its territory, will defend the interests of the European countries. Although the danger of war has diminished in recent years, security guarantees have also been reduced. While the superpowers,

trying to preserve their nuclear supremacy, are dissuading France from building its own deterrence power, the national interests of France request independence in deciding its destiny and choosing its allies. If France wants to prevent aggression its retaliatory capacity must be credible. It must therefore possess a nuclear arsenal (as well as conventional forces) capable of inflicting catastrophic damage on the enemy's territory. The enemy must be convinced of the firmness of the national resolve; he must be sure that France would not hesitate to retaliate if aggression threatens its vital interests. France must be certain of its capacity to unleash war, but it must not involve itself in hopeless enterprises. France's defense must be a defense of peace.

1358
Harrigan, Anthony. CONTROL OF HYDROSPACE. In American Security Council. Washington report, May 1, 1967: 1-4. P&GP RR

Possibilities of reconnaissance satellites and orbital bombardment platforms make Americans recognize the importance of aerospace, but they underestimate the role of seapower. More than 90 percent of the supplies for the U.S. forces in Vietnam move by ocean transport and a considerable portion of the nation's strategic deterrent is sea-based. The Soviet Union threatens to surpass the United States in merchant vessels. Its nuclear submarine fleet is increasing in size and sophistication, threatening to wipe out the American technological lead, menace the Polaris-Poseidon strategic deterrent, and interdict U.S. commerce and maneuvers should war occur. Up to now Defense Secretary McNamara has refused to give hydrospace programs the necessary priorities and has set strict limitations on the number of vessels to be deployed. Meanwhile, the Soviets have stepped up employment of surface forces, and if they acquire base rights at Aden, they will be in a position to operate in east and south-central Africa and the Persian Gulf. McNamara has consistently refused to create a U.S. fleet for the Indian Ocean and the nuclear-powered vessels it would require. Not only has ship construction been neglected, but "the gun gap is also a grim reality." Premature retirement of U.S. battleships has deprived the Navy of a powerful weapon for bombarding the enemy coast in Vietnam. The Navy has the prototype of a 5-inch gun that can be fired 50 miles. It would be an enormous advantage in conflicts with nations with sea frontiers, but McNamara has refused to push its development. The war in Vietnam and the performance of the 7th Fleet have proven beyond doubt the importance of sea-based power to the U.S. security.

1359
Hirschfeld, Oswald. [THE BUNDESWEHR CAN BE WEAKER, BUT DEFENSE MUST BE STRONGER] Bundeswehr kann schwächer--Verteidigung muss stärker werden. Wehr und Wirtschaft, v. 11, June 10, 1967: 320-321. U3.W38, v. 11

The withdrawal of American troops from Europe has begun, with a first contingent of 35,000 men from the Federal Republic, following the 20,000 who left the continent when the U.S. bases in France were relinquished. Finally, the 7th Army has been radically combed for specialists for Vietnam, and the U.S. Air Force has transferred several squadrons back to the States. These will not be the last withdrawals, particularly as the so-called "rotation system" will doubtless very soon prove to be a propaganda farce; if it were really practised, it would obviously be considerably more expensive than the permanent stationing of troops ever was. Nevertheless, the Federal Republic should draw its own conclusions from current changes in its own and NATO's defence situation. Defence Minister Schröder has summarized the "old" new concept of "flexible response" in the euphemistic expression "advanced defence," which is a very doubtful improvement on the present notion of forward defence. Assuming a high atomic threshold, the old problem remains: how to make twelve divisions and the rudiments of a territorial defence force into a system which covers millions of reservists under a mobilization order to defend 1400 km of Eastern frontier. By all appearances the United States expects to receive proposals for a revised German defence contribution; hitherto the Federal Republic has contented itself--not always with much reason--with adapting itself to changes on the "as if" principle. But this cannot go on for very much longer. (Abstract supplied, modified)

1360
Hirschfeld, Oswald. [A NUCLEAR "COMPONENT" FOR THE BUNDESWEHR AFTER ALL?] Also doch: Atomare "Komponente" fur die Bundeswehr. Wehr und Wirtschaft, v. 11, May 20, 1967: 252-253. U3.W38, v. 11

After six months in office, Defence Minister Dr. Gerhard Schröder has now broken his almost legendary silence and outlined his ideas concerning the Bundeswehr's mission and in particular concerning what he terms a complete deterrent, the neutralizing of 1000 Russian IRBM bases which he sees as a potential and permanent threat against the Federal Republic. According to Schroder, this danger must be countered by intercontinental missiles, the deployment and employment of which may not be left to allied powers when one's own existence as a State is at stake. However sibylline and doubtless deliberately vague Dr. Schroder's remarks may be, they nevertheless have a new and hazardous aspect, which he will have to explain to the public in unambiguous detail. Schroder as Defence Minister arouses the suspicion that he is trying to conduct a foreign policy of his own and on his own. It is obviously difficult, if not impossible, to reconcile his remarks with the Federal Government's declared policy renouncing national control over nuclear weapons or national possession of such weapons. (Abstract supplied, modified)

1361
Hirschfeld, Oswald. [SECURITY--A MATTER OF CALCULATION?] Sicherheit--eine Kalkulation? Wehr und Wirtschaft, v. 11, Apr. 10, 1967: 194-195. U3.W38, v. 11

Two eminently disturbing elements have entered quite unexpectedly into United States' nuclear strategy: 1) the possibility that the Soviets, as claimed, have in fact installed anti-missile missiles. Have the Soviets outstripped the Americans on this point? 2) In the matter of nonproliferation, the United States is arousing increasing suspicion that it is seeking to come to terms with Moscow at the expense of its allies and even at the expense of undermining their economic capacity in the field of nuclear development. This problem is one the Soviets need fear less than the

Americans, who are allied chiefly with independent, highly industrialized states. (Abstract supplied, modified)

1362
Johnson, Max S. WARNING SIGNALS FLY--HOW MUCH DANGER FOR THE U.S.? U.S. news & world report, v. 63, July 24, 1967: 34. JK1.U65, v. 63

No matter how successful a nation's tactics, its strategy is crucial and can destroy it. The American Security Council's recent report indicates that the United States is losing ground in its contest for strategic superiority over Russia. Based on mutual deterrence rather than on winning, American strategy and military posture lean strongly on an unrealistic assessment of the enemy's good will. For their part the Soviets are continuing to build their strategic forces; if they actually achieve nuclear superiority they will be able to practice nuclear blackmail on the rest of the world. The U.S. Defense Department is split down military-civilian lines on basic policies. The report goes on to assert that 1967 is the crucial year for continued U.S. military superiority. The Council's report has been criticized as inaccurate (its figures were derived from unclassified sources), but even if it is not exact the conclusions it draws "appear to be all too accurate." History provides evidence. Once the United States had relaxed its pressure following World War II the Soviet bear unsheathed its claws and began a pattern of aggression that has continued to the present. If the United States lets up again Russia will be on top strategically by 1971. This trend, already discernible to the international community, deserves careful appraisal by U.S. leaders.

1363
Jonas, Anne M. STRATEGIC DETERRENCE IN THE 1970's--FIVE PROBLEMS FOR U.S. POLICY. Air Force and space digest, v. 50, July 1967: 32-37. UG633.A65, v. 50

Changes in the general nature of strategic deterrence, due to its dynamic and complex dimensions, may require present U.S. strategic deterrent concepts to undergo alterations if they are to remain viable in the 1970's. The United States must resolve or redefine several problems in order to ensure continued strategic deterrence between it and the Soviet Union. U.S. arms control objectives must be reconciled with future strategic deterrent requirements. Present U.S. efforts at "freezing" offensive weapons suggest "the existence of incompatibility between present arms control objectives and future strategic deterrent requirements." Rapid technological advances in the next decade will make it difficult to project potential interactions between U.S. and Soviet strategic forces. Technological developments "will increase the range of Soviet options for strategic-offensive-force and strategic-defensive-force." Scientific innovations in weapons and detection of missiles have already created an intelligence lead-time lag (e.g. the intercontinental ballistic missile [ICBM] "gap" of the late fifties). Should the United States deploy an antiballistic missile [ABM] system to deter "potential Soviet efforts to achieve an effective first-strike capability?" With the advent of the ABM and submarine-launched ballistic missile [SLBM], the Soviet Union has increased its first-strike capability and has possibly rendered ineffective "assured destruction" by second-strike U.S. ICBM's. The United States must deploy an ABM system to reduce the chances of the Soviets' attaining a first-strike capability and to protect its industrial centers and large portions of the population. Present-day counterforce strategy and the strategy of "flexible response," of which it is an integral part, were developed before the advent of the ABM or SLBM. Thus new weapons and developments in technology require the United States to revise some of its old strategic concepts.

1364
Kahin, George McT., and John W. Lewis. ESCALATION AND EAST ASIA. Bulletin of the atomic scientists, v. 23, Jan. 1967: 20-24. TK9145.A84, v. 23

The rationale of the American military escalation in Southeast Asia lies in the concept of "strategic persuasion," which has "the dual purpose of forcing the enemy to negotiate while at the same time demonstrating to him and the rest of the world American superiority and its uncompromising determination to win the war." This policy has done little to enhance the strategic policy of the administration and has done much to damage the image of the President and all Americans. Instead of bringing about a settlement, military and geographic escalation, evidenced by the increasing number of air strikes over the North and preparations for a possible physical invasion of the demilitarized zone, is bringing the war to the brink of an "explosion." Escalation in the guise of "strategic persuasion" has projected an image of the President as a man who must escalate earlier policies because of the public mood of frustration and impatience they have caused. The fear of domestic political repercussions in the event of a setback feeds this pressure towards escalation. The explosion has yet to take place in Vietnam. The United States can escalate and pursue a policy of brinksmanship so long as it knows when the next step will take it over the edge. In Vietnam the location of the edge is unknown.

1365
Katz, Amrom H. THE SHORT RUN AND THE LONG WALK. Air Force and space digest, v. 50, June 1967: 30-36. UG633.A65, v. 50

The last three wars the United States has fought have been less exclusively military and progressively more inhibited by political considerations. World War II was the last all-out war. Korea was a war of limitations and today the Vietnamese war exemplifies the politically restrained war of the future. It has no front line, nor was there even a declaration of war, and military decisions are determined by political contingencies. There is no front line in Vietnam, so strategists have constructed a statistical front line, which includes kill ratios and statistics on target destructions and weapons lost and captured. The Vietnamese War is also an interdisciplinary war. The United States must solve problems of military victory, pacification, and economic progress simultaneously instead of serially. In order for the United States to better cope with the problems of "wars of liberation," a national agency (National Independence Support Agency) should be created to develop strategy for winning such wars and also for preventing them.

1366
Kishida, Junnosuke. CHINESE NUCLEAR DEVELOPMENT. Japan quarterly, v. 14, Apr./June 1967: 143-150. DS801.J274, v. 14

On the basis of China's 5 nuclear experiments in less than 3 years several assumptions can be made about the course of its long-term nuclear development. First, China is anxious to speed its development of practical nuclear weapons. Although the exact level of Chinese uranium production is not known, it is at least sufficient to produce two atom bombs per month. Second, the yield-weight ratio (explosive power per unit of weight) of Chinese weapons is rapidly improving. China will eventually conduct a full-fledged hydrogen-bomb test and launch a satellite to prove its rocket capabilities. Finally, China has made considerable progress toward building a usable nuclear weapons system, including solid-fuel rockets and submarines capable of carrying medium-range ballistic missiles. It is highly probable that it will successfully test an intercontinental ballistic missile before 1975, the date predicted by Defense Secretary McNamara. China's haste in developing a nuclear capability reflects its desire for a deterrent effective against the United States and the Soviet Union and for greater influence in international affairs. Furthermore China wants to make military development the propulsive force behind the development of industrial technology, an approach used successfully by both the Soviet Union and Japan. As Soviet nuclear strength began to approach that of the United States, its foreign policy threat decreased. The United States cannot avoid a strong containment policy toward China at the present time but must keep in mind that Chinese nuclear development may also eventually result in a relaxation of tensions. Furthermore Chinese technological and industrial progress, prompted by nuclear development, may create a need for expanded foreign trade and thus a new attitude toward the world at large. On the other hand China, the largest and most populous country in Asia, can be viewed as a potential threat to the rest of the world. The Chinese concept of the Middle Kingdom or Celestial Empire--the idea that China is superior to any other nation and is always right--underscores this threat. Therefore all nations must maintain a firm military posture toward China but continue attempts to relax tensions. Although Japan has the technological and industrial capability to develop a nuclear counterbalance against China, it is not in the nation's best interests. Japan's decision to channel its technology into economic development will enhance its own security, and its stands against nuclear weapons and for self-control by the nuclear powers will contribute to the security of the world.

1367
Kolcum, Edward H. STRATEGIC PLANNING CENTERS ON MISSILES. Aviation week & space technology, v. 86, May 6, 1967: 69-74. illus. TL501.A8, v. 86

Future plans for U.S. strategic deterrence will emphasize massive offensive-missile strength. U.S. strategists believe that despite deployment of a Soviet antiballistic missile [ABM] system, strategic deterrence remains viable as long as the United States has an offensive-penetration capability. Because of this the Department of Defense has gone ahead with plans to develop an Advance Intercontinental Ballistic Missile force. This force, emphasizing mobility and trajectory corrections by satellite relay, will incorporate a post-boost propulsion system that can alter its ballistic path, and it will carry multiple warheads that can be dropped on widely separated targets. The Advance ICBM force, which will be represented by Poseidon, Polaris and Minutemen 2 and 3 among others, was designed to preempt new Soviet strategic developments. Since the Soviet Union may develop new strategic systems the United States is also providing development funds for new bombers and interceptors. The offensive penetration aids that are being developed in the Advanced ICBM are part of an overall plan to maintain a strategic force that will "act as a deterrent through both 'assured destruction' and 'damage limitation.'"

1368
Kolodziej, Edward A. FRENCH STRATEGY EMERGENT: GENERAL ANDRÉ BEAUFRE: A CRITIQUE. World politics, v. 19, Apr. 1967: 417-442. D839.W57, v. 19

Contrasts Gen. Andre Beaufre's contributions as a strategist and as an interpreter of Gaullist strategy and director of the French Institute of Strategic Studies, and sharply criticizes the solution that evolves from his merging of the two approaches. Kolodziej covers Beaufre's views on nuclear guarantees, the Atlantic alliance, the French deterrent, nuclear proliferation, European defense and political unity, and a variety of other topics.

1369
Kyle, Keith. BRITAIN AND THE GERMAN PROBLEM. Listener, v. 77, May 4, 1967: 575-577. AP4.L4165, v. 77

NATO's present force strength in Europe is dependent less on military than on political contingencies. Its newly revised forward defense plan, which is based upon political rather than military calculations, is inadequate as an effective holding or deterrent force. Increased depletions of allied troops in Germany (Britain, West Germany, and the United States have recently agreed on the withdrawal of 6,000 British troops from along the Rhine), which resulted from the strategic implications of the East-West détente, have engendered a reappraisal of the need for a constant number of NATO troops to maintain an integrated command structure. Although these troops are insufficient to prevent an enemy takeover in Western Europe they serve to inhibit the formation of a totally uninterrupted German chain of command below the level of Supreme Allied Commander. This type of command is not only unacceptable to the Soviet Union but also could increase the possibility of miscalculating resolve and violence thresholds. However, if proportionate reductions took place in the Bundeswehr, the risk of attack would be minimized, and a commensurate plan of reduction could be achieved in East Germany. The present NATO force exists under a military doctrine applicable only under certain hypothetical situations. Since militarily this force is unrealistic its existence is predicated on political contingencies in Western and Eastern Europe alike, such as the instability of the hated East German regime.

1370
Lall, Betty (Goetz) SUPERIORITY AND INNOVATION IN U.S. DEFENSE FORCES. Bulletin of the atomic scientists, v. 23, Mar. 1967: 11-13. TK9145.A84, v. 23

276-835 O-67—3

Discusses the relative strengths of the U.S. and Soviet strategic forces, and questions the necessity of the overwhelming American superiority. The author suggests that much of the U.S. defense money might be better used on other programs, notes the possibility of adverse Soviet reactions to the U.S. strategic offensive buildup, and questions how the nation expects to halt the arms race if it insists on maintaining this level of superiority. In addition, she questions the amount of effort directed toward the qualitative as well as quantitative improvement of U.S. strategic forces. She concludes that unless more citizens take a greater interest in defense policy, there will be no challenge to the Defense Department's ever-mounting budgetary requests and pursuit of narrow military interests.

1371
Leites, Nathan. WEAKENING THE BELIEF IN GENERAL WAR. World politics, v. 19, July 1967: 709, 711, 713, 715, 717, 719.
D839.W57, v. 19

In his recent book Arms and Influence (New Haven, Yale University Press, 1966) Thomas C. Schelling points to the paradox of our questioning the wisdom of unconditional surrender in World War II and yet accepting unconditional destruction as a matter of course in the next war. The concept of massive retaliation is still accepted on the assumption that deterrence is strengthened by publicly allocating one's assured destruction [AD] capability to "an immediate and single AD attack," regardless of the force of the opponent's attack. The Secretary of Defense has indicated that the aggressor's death must follow inevitably from his deed, yet it is hard to see why this must be so. Destruction of the aggressor as a means of preventing future wars is a concept long in disrepute. And where some moral systems may favor retaliation as the only adequate response to an extreme deed, "Western sensibility in the era of Vatican II" does not. Nonetheless the belief seems to survive that even when a nation's objectives are modest, it can inflict unlimited damage on the enemy as long as the war continues and the enemy inflicts some damage on it and threatens more. The notion persists that if any nuclear weapons are used, they are bound to be used in an all-out fashion. Furthermore, we tend to assume that if the enemy attacks and we release a counterforce strike, his remaining devastation potential will be used against us. We fail to consider that some other use for this potential may seem more attractive or that "the probable value of terminal devastation [may] sink below the ultimate capability to kill value." Isn't it preferable to coerce by threats, bargaining, or the gradual use of force than to use one's devastation potential all at once? Small attacks will not disarm either belligerent, but they can change the relationship between nuclear forces to the attacker's advantage by rationing the exchange of force in a manner favorable to the attacker. A whole range of attacks is possible that can modify the opponent's conduct by influencing his perception of the consequences if he does not meet the attacker's demands.

1372
Loosbrock, John F. THE CHANGING MILITARY STRATEGIC BALANCE [editorial] Air Force and space digest, v. 50, Aug. 1967: 6.
UG633.A65, v. 50

The Soviet Union is overtaking the United States in the arms race. The Russians have surpassed the United States in total megatonnage-delivery capability. The Vietnamese War has overshadowed U.S. strategic power relationships with the Soviet Union, and consequently U.S. strategists believe that mutual deterrence is realistic and political accommodation sincere. However Soviet policymakers, acting on a different set of premises, continue their drive for strategic superiority.

1373
McConnell, John P. WHAT THE AIR FORCE IS LEARNING FROM VIETNAM. Air Force and space digest, v. 50, May 1967: 44-47.
UG633.A65, v. 50

The U.S. Air Force role encompasses not only deterrence but also support of ground forces, as in the Vietnam War. There U.S. bombing has placed a heavy price on the Communist insurgency through the interdiction of supplies to the rebels and invaders in the South. The Nation and its Air Force will learn from Vietnam that U.S. determination and capability can curb aggression. The aerial tactics and equipment developed in Vietnam will aid in fighting any other conventional conflict, and the decisiveness of the role played by airpower will influence the development of future strategy and tactics. Limited war cannot be won without airpower. Even in Vietnam, probably an area less amenable to the employment of airpower than any the United States has faced, this factor has proved decisive, for the Air Force has adapted to the exigencies of the terrain and limitation of the war. In the years ahead the United States will have to maintain a state of military readiness. Mobility will be all-important. Potential threats from outer space must be countered; this is also the job of the Air Force. As part of a total national strategy the Air Force will continue to play a crucial role.

1374
Macmillan, Norman. [GREAT BRITAIN'S DEFENSE--1967] Grossbritanniens Verteidigung--1967. Wehr und Wirtschaft, v. 11, Apr. 10, 1967: 216-218.
U3.W38, v. 11

Reviews the British defense budget for 1967/68 outlining the nation's future military posture compared to its present one. Rationalization of British military expenditures by employment of data processing methods is also discussed. The author emphasizes the development and acquisition of modern military aircraft for the British armed forces.

1375
Mark, Wilhelm. [AFTER THE STORM] Nach dem Sturm. Allgemeine schweizerische Militärzeitschrift, v. 133, July 1967: 403-406.
U3.A43, v. 133

Lessons for Switzerland can be drawn from the latest Near East war and from Israel's defense posture and problems. Israel stood alone against an enemy that threatened its very survival. The presence of the American Sixth Fleet in the Mediterranean deterred Soviet military intervention in the area but Israel could have been sacrificed anyway (as was Czechoslovakia in 1938) on the altar of the big powers' concern over world peace. After all, the Arabs were abandoned by the Soviet Union at a crucial point because of the Soviet fear of a nuclear confrontation with the United States. Thus the Near East war,

although nonnuclear, was very much influenced by the big powers' nuclear arms and strategies. Clearly Switzerland in its security planning must not ignore the possibility of "such a power-politics constellation," which would throw the nation completly on its own resources, without help from anywhere. Much can be learned from the Israeli people's spirited and material defense posture and their conduct in war. However many features of the Israeli strategy do not apply to the different topography found in Switzerland.

1376
Meyerhoff, Arthur E. PLAN FOR ACTION. In his The strategy of persuasion; the use of advertising skills in fighting the coid war. New York, Coward-McCann, 1967. p. 173-181. diagr.
E744.5.M45

Expounds on the importance of advertising methods to the ideolo$_g$ical struggle between the power blocs. Meyerhof suggests establishment by the United States Government of a Department of External Relations to apply those methods in the cold war with communism. He feels such an agency would be "a basic investment in saving millions of human lives."

1377
Miksche, Ferdinand O. [EUROPE AND THE GAME BETWEEN THE GIANTS] Europa und das Spiel der Giganten. Wehr und Wirtschaft, v. 11, Apr. 10, 1967: 200-202.
U3.W38, v. 11

The under-cover struggle for power between the USA and the USSR today exercises a decisive influence on the policies and fate of the peoples of this world. On this point nobody is deceived by the highly publicized gestures of conciliation in Washington and Moscow or by President Johnson's desperate attempts to come to an understanding with the Muscovites in the nuclear weapons field. The Soviets are in a better position than the Americans, who from the beginning have failed to foresee how far their commitment in Vietnam, a commitment which, moreover, is growing into a vast economic burden, would hamstring them in the field of foreign policy. These facts threaten to separate the United States more and more from Europe and NATO, the Western world's only defensive alliance. American policies have done more to modify this alliance than has General de Gaulle. It is becoming increasingly clear that the Europeans--in particular the Federal Republic--will have to reconsider the questions of their national security and defence if they are not to become the victims of an egoistic policy of détente without realistic aims, and if they are to keep themselves from being ground between the millstones of the two opposing powers. (Abstract supplied, modified)

1378
Miksche, Ferdinand O. [1970-1980: SURRENDER WITHOUT WAR] 1970-1980: Capitulation sans guerre. [Paris] La table ronde, [1966] 257 p. maps.
CB160.M5

Despite considerable economic development and technological progress, prospects for the world's future are not encouraging. This is a period of immense change. A contest for spheres of influence is being waged throughout the world. Communism is far from defeated, and a passive Western policy enables it to expand into the Third World, where the West is struggling to establish democratic regimes. In the future the Mediterranean area and Near East will be more vital than ever for Europe, whereas the United States will become more concerned with Asia, the Pacific, and Latin America. If America becomes less interested in European affairs, this will probably force Europe to develop its own military force and strategy to meet its security requirements. The present situation in Europe is basically unstable. The acceptance of "peaceful coexistence" by the West, the ensuing détente, America's interest in disarmament, and its engagement in Vietnam have finally brought about the decline of NATO. Undoubtedly the failure of Western military policy has contributed greatly to this development. While the armament of the Communist countries is founded on the simple concept of a balance of nuclear and conventional weapons, Western power is based on nuclear force. And while Communist strategy is flexible and offensive, Western strategy is only defensive. NATO's adoption recently of a strategy of flexible response has raised legitimate doubts in Western Europe about the efficacy of the Alliance. Today Western Europe is threatened by two dangers: political infiltration and subversive action from the South and frontal pressure along the Iron Curtain. This danger will persist through 1980. Therefore the main objective of European strategy during this period must be to master the crisis in the Near East and Mediterranean and construct a barrier in Europe to protect the Baltic Sea-Alpine axis. For this, Western Europe must have a conventional force as well as a nuclear one. It must develop an integrated military strategy, and this presupposes a politically united Western Europe. The future of the Atlantic world depends on the West's ability to give new meaning to the Atlantic Pact, organize independent European and American strategies even on the nuclear level, and develop an integrated policy in the Third World. If Europe and America become equal partners, their common efforts might prevent the world from succumbing to Communist domination.

1379
[MOBILE DEFENSE AND THE GERMAN GENERAL STAFF] La défénse mobile et l'état-major allemand, by J. H. Perspectives, v. 23, Apr. 8, 1967: [item 1] 1-5.
An abridgment of an article in Der Spiegel, Nov. 21, 1966. P&GP RR

An account of Colonel von Bonin's thesis concerning the strategic defense of Western Europe. Von Bonin's strategy is based upon a strong, well-equipped, specialized, and maneuverable West German army; the use of antitank weapons, rocket launchers, and other conventional weapons; and the ability to provide an elastic defense against enemy "probes" and intrusions into allied territory. He feels that West German sharing in nuclear weapons is unnecessary, since any full-scale attack would be met with massive retaliation by the United States. The author, criticizing von Bonin's thesis, states that the inflexibility of the Bonn Government toward allies and enemies alike prevents the Government from undertaking any separate action in support of this thesis.

1380
Montfort, Colonel-divisionnaire. [LOOK OUT: ATOMIC WEAPON!] Attention: arme atomique! Revue militaire suisse, v. 112, Apr. 1967: 141-148.
U2.R5, v. 112

Switzerland must make a military decision and choose between planning for conventional or atomic defense. If it undertakes to incorporate in its military strategy only the former then it must recognize that in terms of conventional strategy the military situation in Western Europe is not reassuring. The strategic defense of Europe, as formulated in 1949 under NATO and again in 1952 at the Conference of Lisbon, is today an ineffective alinement due partly to the belief of most NATO members that any future war will be atomic. The dissension in NATO has also contributed to weakening conventional strategy. France, Great Britain, and the United States find cooperation increasingly difficult in the formulation of an efficacious defense plan. The Swiss view conventional war more as a measure to buy time in determining the conditions and levels of flexible response than as a positive offensive strategy designed to achieve victory. Thus Switzerland, because of its strategic location, will have to employ a realistic plan of military operation under conditions of atomic warfare. In this respect, because of its topography Switzerland will be able to carry out two important objectives: to drive back occupation forces with armed divisions and to protect the civilian population by constructing underground shelters. To succeed in the event of war the Swiss military hierarchy will have to incorporate in its strategy and tactics a new concept of defense and counteroffense during an atomic war. Should conventional war continue after an attack by the enemy this concept will also remain applicable.

1381
Montfort, Colonel-divisionnaire. [WHAT'S NEW AT NATO?] A l'OTAN, quoi de nouveau? Revue militaire suisse, v. 112, May 1967: 189-195.
U2.R5, v. 112

Discusses Kenneth Hunt's analysis of the effect of France's withdrawal on NATO. Because of its dependence on allied airspace for any use of its force de frappe, France could still never remain neutral during a war between East and West. However, the withdrawal of France has engendered a call for the complete reorganization and modernization of NATO forces. Hunt believes that the departure of France's Air Forces has had a most serious effect on NATO, but that even this can be remedied if NATO alters its objectives. Montfort feels that NATO is in trouble; its conventional forces are steadily decreasing, and U.S. responsibility for them is weakening.

1382
Moss, Norman. MCNAMARA'S ABM POLICY: A FAILURE OF COMMUNICATIONS. Reporter, v. 36, Feb. 1967: 34-36. D839.R385, v. 36

"McNamara is the first Secretary of Defense to prescribe strategies for this country's defense in the hope that they [the Russians] will adopt them for their own sake as well as ours." For the most part this policy of strategic communication has failed. The clearest rejection of American strategic concepts is the deployment by the Russians of an antiballistic missile system. Russian strategists believe that the ABM system will enable Russia to rely on its own capabilities rather than on the good will of another nation. However, because of American numerical missile superiority the Russian ABM system makes little sense, unless it is for defense against a weaker power--possibly China. Second-strike weapons, which allow strategists time for evaluation and judgment, are basic to the American desire to maintain strategic stability. First-strike weapons, be they active (defensive missiles) or passive (civil defense), would be destabilizing. American defense experts hope that through subtle channels of communication they can induce the Russians to accept a stability and counterforce strategy. However, to the Russians such a strategy implies only that the Soviet Union should abide by certain "rules" during war. Paradoxically, the Russians in the midst of their rejections of American proposals have in fact indirectly accepted them by converting most of their missiles into second-strike weapons. This action is based less on the effect of American suggestions than on military common sense. The failure to achieve much strategic understanding between the great powers does not indicate a failure of American nuclear strategy but that the strategic game is a new one, and that it will be a while before even McNamara convinces Congress of the correctness of this approach.

1383
NEW DEFENSE LINE IN PACIFIC. U.S. news & world report, v. 63, Aug. 7, 1967: 52-54.
JK1.U65, v. 63

Pentagon planners are looking for new U.S. strategic bases in the Pacific, to which forces may move within 3 to 5 years or sooner. That Pacific troops will be closer to home than at any time since World War II is occasioned by Red China's growing nuclear strength and by the desire of other Pacific nations to have the United States pull out of their territory. Four of the islands of the Marianas group--Guam, Saipan, Tinian, and Rota--have the votes of America's top military men for new bases. Although Guam now belongs to the United States, the other three are merely administered as U.N. Trust Territories by Washington. Yet all four islands would be necessary to make up for the huge American bases in Japan, the Philippines, and, largest and most valuable of all, Okinawa, which will probably have to be given back to Japan eventually. On the other hand, present U.S. bases will soon be easily within range of Chinese nuclear weapons. In most ways the Marianas fill the bill, except for the question of America's right to use the three U.N.-owned islands for military bases. Precedent exists in Washington's use of Kwajalein for nuclear testing. Moreover there is some likelihood that the people of the Marianas will vote to unite with Guam, thus putting the islands directly in the hands of the United States. State Department officials and the U.N. Trusteeship Council oppose a move that would split the larger island group, Micronesia, but the Pentagon would like a clear-cut decision on the Marianas soon.

1384
Nikolaev, Vladimir. POLARIS DIPLOMACY. Daily review, translations from the Soviet press, v. 13, May 10, 1967: pt. 1, 1. Slav Rm
Translated from Pravda, Apr. 6, 1967.
Slav Rm

The United States' presence in the Mediterranean creates a real danger for the national interests of the peoples in the Mediterranean area. Yet this policy is still an integral part of the extremely dangerous U.S. foreign policy. The Pentagon maintains the U.S. 6th fleet (including 50 warships), aircraft and marines in the area, plus a network of military bases on the territories of the coastal states. One of them is the big

Polaris nuclear depot in Rota (Spain), and another the nuclear launching pad on Crete. The purpose of these activities is well known. The bases are supposed to support the predatory policy of the imperialists in the Mediterranean area. But times are changing. Today the Americans are meeting much stronger opposition in the Arab states, Turkey, Greece, and Spain, which are all calling for the removal of bases and the withdrawal of the U.S. 6th fleet at the earliest possible date.

1385
Noorani, A. G. INDIA'S QUEST FOR A NUCLEAR GUARANTEE. Asian survey, v. 7, July 1967: 490-502. DS1.A492, v. 7

Gives a detailed account of the Indian government's efforts to obtain a nuclear guarantee from the great powers against the threat of Chinese nuclear power. After three years of failure in its quest to get a specific guarantee, India has begun to openly question the credibility of any nuclear guarantee. But despite the evident differences in the American and Soviet policies on maintaining India's political stability, India remains in favor of a joint guarantee. The author notes that if India is to develop her own nuclear capability it must not replace diplomacy with nuclear weapons. It must instead follow a diplomacy that will not only maintain its integrity but make its independence (from China) of vital interest to other nations.

1386
Russett, Bruce M. PEARL HARBOR: DETERRENCE THEORY AND DECISION THEORY. Journal of peace research, no. 2, 1967: 89-106. AS9.J6, 1967

According to most analyses, Japan's decision to attack the United States at Pearl Harbor in 1941 can only be explained as an act of irrationality, given the difference in relative power of the two nations. This article contends that for most purposes of analyzing national decision-making the rationality-irrationality distinction is not useful, and suggests instead a detailed analysis of certain components of the decision and of the alternatives considered. The Japanese decision must be seen in the context of their possible attack on third parties, notably the British and Dutch colonies in the Southwest Pacific, and the deterrent threat posed by some probability that the United States would resist the attack even though its own territory was not directly involved. A general decision-theory model was developed and tested on 17 cases in the earlier work of the author. It considers the utility to the decision-makers of each of the three possible courses of action: no attack at all (retain the status quo), attack third party only, and attack also the major power which poses the deterrent threat to protect the third party. The utilities must be weighted by the probabilities attached by the decision-makers to the achievement of each outcome. In this case the Japanese government attached strongly negative utilities to the status quo. Furthermore, though it would have greatly valued an unresisted attack on the European colonies, it considered it very unlikely that the United States would fail to respond militarily. It reached this assessment on the basis of extensive military, political, and economic ties between the United States and the Southwest Pacific area, despite the absence of an overt alliance. Hence, by comparison, attacking the United States directly had some attractions, given the vulnerability of the Pearl Harbor fleet and certain (mistaken) assumptions about United States willingness to conduct a long war. (Abstract supplied, modified)

1387
Rutherford, Evan. THE NEW ARMS RACE. Cambridge review, v. 89, Feb. 1967: 244-245, 247-249. LH5.C2C3, v. 89

Two conclusions have been reached concerning deployment of antiballistic missile [ABM] defense systems: a mutually effective antimissile defense is impossible, and antimissile defense systems associated with strategies of offense are improbable. Just one intercontinental ballistic missile [ICBM] could inflict unacceptable damage, while mutual antimissile defense on a "balance" level is technologically impossible. The Soviet Union is probably deploying its ABM system to remove the strategic option of nuclear war that the United States possesses as a result of its numerical missile advantage. Arguments of a new, more dangerous escalation notwithstanding, a new arms race is imminent, and the specter of a new "missile gap" raises itself once more. Because of the war in Vietnam, however, American ABM expenditures are unlikely to reach proposed levels. It is more likely that some influential Americans will distort the significance of the ABM to justify a first strike against China. In practical terms the belief that "the ICBM will [never] get through" can only engender a false complacency with tragic results.

1388
Schmückle, Gerd. ["BIG LIFT" AND A CRISIS STRIKE FORCE: NEW TENDENCIES AND POSSIBILITIES IN WESTERN DEFENSE PLANNING] "Big Lift" und Krisen-Streitmacht. Neue Tendenzen und Möglichkeiten in der westlichen Verteidigungsplanung. Europa-Archiv, v. 22, Apr. 25, 1967: 279-286. D839.E86, v. 22

Considers American striking forces designed for crisis management. Schmückle discusses their potentialities within the NATO defense system and the impact of the controversial "Big Lift" concept on NATO strategy itself. He outlines Big Lift's weapons systems, including present and future sea and air transport.

1389
Schneider, Ferdnand T. [FRENCH DEFENSE POLICY] Die französische Verteidigungspolitik. Wehr-Wissenschaftliche Rundschau, v. 17, Apr. 1967: 181-194. U3.W485, v. 17

A lecture delivered Oct. 27, 1966, in Bad Godesberg at the annual meeting of a West German scientific organization dealing with defense research, Arbeitskreis für Wehrforschung.

Traces the development of French defense policy and military posture from 1945 to the present. Schneider considers the respective structures and roles of consecutive "generations" of the French nuclear deterrent, France's tactical land, air, and naval forces, as well as the operational defense plans of its territory. He discusses the influence of the nation's foreign policy on France's military alliances and the difference between Washington and Paris on the world's present geopolitical and geostrategic situation. To repel actual agression the French military concept suggests simultaneous employment of France's tactical and strategic forces.

1390
Schwarz, Urs. AMERICAN STRATEGY: A NEW PERSPECTIVE; THE GROWTH OF POLITICO-MILITARY THINKING IN THE UNITED STATES. Preface by Henry Kissinger. Garden City, N. Y., Doubleday, 1966. 178 p. E745. S35
Bibliographical footnotes.

Contents. --Thought and experience in World War I. --A peace-loving yet military republic. --Thought and experience in World War II. --Natural science and strategy. --Massive retaliation and limited war. --Thinking about the unthinkable. --Advanced thought applied. --From zero to leadership.

Attributes a great deal of the misunderstanding between West European and American defense planners to Europe's lagging behind the times in strategic thought. Schwarz traces the development of the latter in the United States, especially over the past two decades. He feels that the "historic role of strategic doctrine" of defining and finding remedies for likely challenges "has been magnified in the nuclear age." He hopes that future growth of a common American-European "politico-military thought"--an Atlantic Community of Thought, cherishing similar traditions and cultivating common beliefs--would profoundly contribute to international peace and security.

1391
Stevenson, Charles S. AFRICAN ARMED FORCES. In U. S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, Mar. 1967: 18-23. tables. Z6723. U35, v. 47

Military forces in the 35 independent African nations south of the Sahara are small and modestly equipped because the continent is not threatened from outside, no major internal conflicts exist, and money for substantial defense spending is lacking. The size of the armies, length of military service, and type of reserve forces vary greatly within this area--from Gabon with 500 men to Ethiopia with 32,000 men. The defense budgets of sub-Saharan countries average 5 percent of their gross national products and are all supplemented by foreign aid, except for Rhodesia's. In addition to providing training and equipment foreign countries often maintain mutual defense agreements with their former colonies. Although foreign troops are stationed in colonial areas for administrative purposes, only a small number of foreign strategic forces are located in sub-Saharan Africa. Since sub-Saharan armed forces are not expected to grow substantially, they will probably not be a military factor in the world aside from their possible use in U. N. peacekeeping operations. Instead, the military will be actively involved in promoting internal security and stability.

1392
Thompson, W. F. K. STREAMLINING BRITISH DEFENSE. In U. S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, Mar. 1967: 24-27. Z6723. U35, v. 47
Reprinted from the British newspaper Daily Telegraph, Aug. 17, 1966. Newsp

Great Britain faces the dilemma of reshaping its Armed Forces to conform to cuts in defense spending while continuing to protect its interests overseas. The long-term solution would be for Britain to redirect its foreign policy toward joining a united Western Europe as a base from which to help the United States maintain a global balance of power, toward unifying East and West Europe as a force independent of Russia and the United States, or toward rebuilding British maritime power. Although bringing some of the overseas troops home would provide immediate relief of the defense burden, the Armed Forces would suffer from shortages of living accommodations and training facilities. To cut Britain's limited fighting forces would be unwise; more advisable would be a structural reorganization that would create a common Defense Board to administer the Army, Navy, and Air Force. In order to attract quality personnel Britain must define clearly the goals of the Armed Forces reorganization that began in 1957.

1393
THE UNITED STATES SHOULD HAVE THE FAR-SIGHT AND POWERFUL DRIVE TO ELIMINATE THE GREATEST CRISIS OF MANKIND IN TIME. West & East, v. 11, Dec. 1966: 6-7. Chi Kor
"Editorial of the Shin Sheng Pao, Taipei, November 3, 1966."

The occurrence of the 4th Chinese Communist nuclear test increases Nationalist Chinese concern for their own security as well as for the security of the many Asian countries opposed to a Red Chinese takeover in the area. While the United States pledges the protection of her nuclear umbrella against any nuclear threat or encroachment by the Chinese Communists, faith in her is not strong. The freedom-seeking people of Nationalist China wonder whether the United States would be willing to engage in a major nuclear war, which would probably also involve the Soviet Union, to save the non-Communist and anti-Communist nations of Asia. In addition, if American pledges are sincere, why doesn't she take steps to invade the mainland and eliminate the source of trouble in Asia. If she is not determined to support us in launching a counteroffensive, "how can she make Asian nations believe her promise of protecting their security even by going to . . . war and even a world nuclear war against Red China?" This doubt in the mind of Asians disturbs their faith in America and turns them in the direction of neutrality and communism. Despite warnings from the United States, Red China is speedily becoming a nuclear power. Now is the time to eliminate this greatest danger to mankind.

1394
Van Cleave, William R., and Harold W. Rood. A TECHNOLOGICAL COMPARISON OF TWO POTENTIAL NUCLEAR POWERS: INDIA AND JAPAN. Asian survey, v. 7, July 1967: 482-489.
DS1. A492, v. 7

The development of India's nuclear energy program has been remarkable, especially in view of its limited technical and industrial resources. Japan, on the other hand, is using its nuclear energy program as a means to further develop and improve an already sophisticated industrial base. Unlike Japan's, India's need for nuclear energy is based on present technical and industrial incapacities. By 1975 its electrical capacity will have to be 7.3 times greater than it was in 1960. Today India's nuclear program is more advanced than Japan's, due primarily to the large deposits of thorium and uranium in India. Although Japan's nuclear program has been more deliberate than India's, it is more diversified. Whether these two countries will pursue concomitant development of nuclear weapons remains to be seen.

1395
Waldman, Eric. GERMAN RESERVES AND REPLACEMENTS. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, Apr. 1967: 21-27.
Z6723.U35, v. 47

An examination of the German Federal Republic's military reserve system is useful in evaluating the German ability to mobilize troops for NATO's wartime forces. In time of emergency individual reservists would be called to staff the understrength active-combat units. Currently totaling 900,000, the reservists are classified in three groups according to age and length of military service and divided into six categories representing the military units that will utilize their services when they are called back to active duty. In order to conserve military administrative talent, civilian personnel help administer the reserve system and the standby reserves, which are composed of eligibles not called by the draft. Since facilities for mandatory training of reservists are limited, most training is done voluntarily through an Army school, active duty with an Army unit, and group training sessions organized either by the Superintendent for Reservists or the private reservists' association, the Verband. Organized in 1960, the Verband has received Federal Defense Ministry funds to improve its capabilities in handling about two-thirds of all reservists who volunteer for training. The ability of the German reserve system to meet its peacetime and wartime commitments with a mixture of military, civilian, and private elements will depend on the priority placed on the system by the highest authorities.

1396
Ward, Chester. MCNAMARA: BURNHAM DARED CALL IT REASON. American opinion, v. 10, May 1967: 1-16.
AP2.O4732, v. 10

Rebuttal of James Burnham's defense of Secretary of Defense McNamara (see abstract no. 786 in vol. 3, no. 2). Ward attacks McNamara for degrading and discrediting the adequacy and credibility of the American strategic deterrent, for refusing to deploy an antimissile defense system, for advocating arms reductions and disarmament, and for casting doubts on U.S. willingness to use nuclear weapons to defend Europe. Ward concludes that since the President appears to be a complete captive of McNamara and his clique of "liberal ideologues," Congress, "on the verge of open and almost unanimous revolt against McNamara," is the only hope for victory in Vietnam and for the survival of the Nation.

1397
WARNING SIGNALS FLY FOR U.S. IN THE NUCLEAR RACE. U.S. news & world report, v. 63, July 24, 1967: 32-33. illus. JK1.U65, v. 63

Presents in chart form the highlights of a report to Congress on the status of the arms race between the United States and the Soviet Union. Prepared by the American Security Council, the report concludes that "the Soviet Union is succeeding in its massive drive toward strategic military superiority and that the United States is co-operating in this effort by slowing down its side of the arms race."

1398
Weinstein, Martin. DEFENDING POSTWAR JAPAN. New leader, v. 50, July 3, 1967: 12-14.
HX1.N37, v. 50

The very existence of modern, well-equipped Japanese defense forces seems to violate the prohibition against maintaining a military establishment which is contained in article 9 of Japan's constitution. However, "the spirit of the article is still very much alive." Article 9 is more than a prohibition against military forces. It is intended to keep Japan out of foreign military adventures of the sort that led it into World War II, prevent the resurgence of militarism, and reflect the anti-war sentiment among the Japanese people. The Japanese government has imposed strict limitations on the use of its Self-Defense Forces. Its aircraft have neither the range nor the capability to attack overseas targets, and public opposition to deploying Japanese forces overseas is so strong that Japan does not contribute to U.N. peacekeeping forces. Its Defense Agency is only an adjunct to the Prime Minister's Office and does not enjoy ministry status. Current defense expenditures hover just over 1 percent of the GNP, a level among the lowest in the world. This is remarkable considering Japan's position as the third most powerful industrial nation in the world. Public opinion polls show strong moral disapproval of any but the minimal defense forces. Furthermore, the U.S.-Japanese Security Treaty provides a defensive shield that eliminates the need for any expansion of the Self-Defense Forces. On the other hand external conditions can change. The war in Vietnam may affect U.S. military commitments in the Far East, and nuclear missiles may alter Chinese policies. Unless the Far East becomes more stable than anyone now anticipates, it will require all of Japan's ingenuity to meet its security problems in accordance with article 9.

1399
WILL RED CHINA NOW RISK WAR? U.S. news & world report, v. 62, May 29, 1967: 38-40.
JK1.U65, v. 62

As the Vietnamese war enlarges the danger of U.S. confrontation with Communist China grows. However, Chinese leaders are eager to avoid war at a time when their nation is seriously weakened by internal unrest. Recent word from Peking indicates China would intervene directly in Vietnam under any of three conditions: if Hanoi asked for help, if Peking felt its security threatened by a U.S. invasion of the North, or if Russia and the United States attempted to force Hanoi into a settlement unacceptable to China. Intelligence estimates throughout the world seem to confirm this view. The danger of war cannot be discounted, but China is highly vulnerable and "would have its hands full if it picked a fight with the U.S." U.S. air and naval power and South Korean and Nationalist forces in that case would hit the Chinese mainland hard. Tibet, Inner Mongolia and Sinkiang would openly rebel. Because of the bitter feud between them, Russia would be unlikely to come to China's aid. China has inexhaustable manpower, but lacks mobility, long-range weapons, and defensive airpower. The United States could destroy China's warmaking ability quickly without using any but conventional weapons, and without suffering any damage from China in return.

1400
Wolfe, Thomas W. SOVIET MILITARY POWER AND EUROPEAN SECURITY. [Santa Monica, Calif., Rand Corp.] 1966. 51 p. ([Rand Corporation. Paper] P-3429) AS36.R28, no. 3429

Examines "the military dimensions of Soviet policy toward an evolving Europe." Wolfe contends that the Soviet military threat to Europe had considerable influence in bringing the NATO defense alliance into being, and the change in the character of this threat will to some extent determine NATO's future role. The paper concentrates on Soviet-European relations in the last years of Khrushchev's rule and the period since his successors came to power, but also includes some historical background. Wolfe feels that the dissolution of the Warsaw alliance is unlikely for some time, and that collective defense measures against the Soviet military threat in Europe continue to be of great importance.

1401
Wolfe, Thomas W. SOVIET MILITARY THEORY: AN ADDITIONAL SOURCE OF INSIGHT INTO ITS DEVELOPMENT. [Santa Monica, Calif., Rand Corp.] 1965. 49 p. ([Rand Corporation. Paper] P-3258) AS36.R28, no. 3258

Compares the 1960 and 1964 versions of On Soviet Military Science by S. N. Kozlov, M. V. Smirnov, I. S. Baz, and P. A. Sidorov and analyzes the changes that have taken place in Soviet strategy in the 4-year interval between editions of the book. Wolfe deals with the authors' views on the changing role of strategic missile forces and their influence on the outcome of future wars, the various stages in the development of postwar Soviet military theory, and the relationship between Soviet politics and military theory.

D. CONSEQUENCES OF NATIONAL DEFENSE POLICIES AND WAR

1. Biological

1402
Allkofer, O. C., J. M. Fox, and H. Hauser. [RADIONUCLIDE COMPOSITION OF STRATOSPHERIC FALLOUT THREE YEARS AFTER THE ATMOSPHERIC NUCLEAR-WEAPONS TEST SERIES HAS BEEN STOPPED] Nuklidzusammensetzung des stratosphärischen Fallout drei Jahre nach Beendigung der Kernwaffentestserien in der Atmosphäre. Atomkernenergie, v. 11, Nov./Dec. 1966: 467-476. diagrs., tables. QC770.A8, v. 11

Bibliography: p. 466.

A quantitative total analysis of the beta- and gamma-ray emitting radionuclides of the radioactive fallout in 1965 from the stratosphere and troposphere is presented. The result of this investigation leads to an estimation of the age of the radioactive debris to about three or four years. So one can conclude that, in the main, fallout from the nuclear tests of the US at the equatorial region is detected, since the age of debris from the Russian polar tests is less than three years. The result of the analysis also leads to the conclusion that the mean energy of the fission neutrons of tests in the MT-range is about 9 or 10 MeV and not about 6 or 7 MeV. Furthermore the analysis indicates that fractionation of global stratospheric fallout takes place only to a very low extent, and in this case fractionation will be restricted only to the first phase after a test-explosion. The occurrence of the short-lived nuclides Zr 95 and Ru 103 is discussed and correlated to the Chinese nuclear test in May 1965. The result of the measurements leads to the conclusion that probably U 235 or U 238 enriched with U 235 was used as a fuel. Finally, an estimation of the production rate per MT TNT of the induced radionuclides Mn 54 and Co 57 is given from their relative intensities and their generating reactions are discussed. (Abstract supplied, modified)

1403
Brown, Bernice B. LONG-TERM RADIATION DAMAGE: EVALUATION OF LIFE-SPAN STUDIES. Santa Monica, Calif., Rand Corp., 1966. 66 p. (Rand Corporation. Memorandum RM-5083-TAB) QI80.AIR36, no. 5083

"Research . . . sponsored by the San Francisco Operations Office of the U.S. Atomic Energy Commission under contract AT(04-3)-414."

Explores the "literature on radiation life shortening." Experiments with rats and mice indicate that irradiation of adult animals has life-shortening effects that increase linearly with the dosage. A dose of 500 roentgens has greater life-shortening effects the younger the animal. Animals about 4 months old exposed to 500 roentgens lost approximately 0.3 to 0.4 days of life per roentgen. From these animal studies the effect of radiation on man was extrapolated, and it was hypothesized that a single acute exposure would shorten human life by 7 to 12 days per roentgen.

1404
Cousins, Norman. RESEARCH AND RE-SENSITIZATION [editorial] Saturday review, v. 50, Aug. 5, 1967: 20, 57. Z1219.S25, v. 50

Should American universities conduct research for the Government for purposes that are objectionable to them, such as the development of chemical and biological weapons? And even more significantly, should this nation engage in chemical and biological weapons research in the universities or indeed anywhere else? Moral judgment should not be suspended whenever national security is involved. The American people must distinguish between the various forms of warfare and place limits on the types of weapons used. Even in the middle of World War II, President Franklin D. Roosevelt announced that the United States would not use poison gas unless the enemy did so first. The development of nuclear weapons, however, has accustomed man to indiscriminate killing, to the point where when the Government announced several years ago that it was abandoning the 1925 Geneva Convention and conducting research on chemical and biological weapons in the name of national security, there was little public shock or indignation. The Nation has made no effort to seek an international ban on these weapons at the United Nations or elsewhere. Some argue that the very existence of weapons is assurance they will not be used, but history has shown otherwise. The same reasoning that prompts nations to begin such research, because they fear that their enemies are already doing the same, will also create the need to use the weapons before someone else uses them first.

1405
Feller, M. [PRIMARY AND SECONDARY EFFECTS ON HUMAN BEINGS OF RADIATION FROM A NUCLEAR EXPLOSION] Primäre und sekundäre Wirkung der Lichtstrahlung einer Kernwaffendetonation auf den Menschen. Zeitschrift für Militärmedizin, v. 8, Feb. 1967: 17-26. illus.
P&GP RR

Bibliography: p. 26.

Inquires into the properties of radiation impulses from nuclear explosions to determine theoretically the relative skin damage from such radiation and find ways of protecting against it. Feller contends that the extent of an individual injury depends on the strength, altitude, and range of sight of a detonation. However, he explains that it is not possible to compute directly theoretical "irreversible skin damage" from equations of the pertinent "heat conductors." The author considers flash burns, contact burns, and scorch burns as primary skin damage, and flame burns as secondary.

1406
Fervers, Hans. [SITUATION ANALYSIS OF THE GROWING THREAT FROM RADIOACTIVITY.] Situationsanalyse der zunehmenden radioaktiven Gefärdung. Das Gewissen, v. 12, Apr. 1967: 1-3.
P&GP RR

Seeks to show that the cumulative effects of radioactivity from peaceful uses of nuclear energy are more dangerous to human life than those from military uses. Fervers considers most published data about tolerance doses for radioactivity misleading and points out that expert opinion on the matter is being misinterpreted by enthusiasts of the industrial use of atomic energy. Tolerance doses cannot be established now, because essential experimental data is not available and will not be available for a long time to come.

1407
Freerksen, E. [IMMUNOBIOLOGICAL OBSERVATIONS OF EXPERIMENTAL RADIATION EFFECTS] Immunbiologische Beobachtungen bei experimenteller Strahleneinwirkung. Wehrmedizinische Monatsschrift, v. 11, May 1967: 132-137. diagrs.
P&GP RR

This study was undertaken to investigate the relationship of irradiation to infection in experimental mouse tuberculosis. After total body irradiation 14 days before infection even 550 r. did not influence the development of tuberculosis. At a dose of 550 r. and 350 r. 8 days after infection the radiation result and the infection affect the liver, independent of each other, but both damages, summed up, cause a shortened survival time. In regard to the induced infection there was no breakdown of general resistance in animals subjected to irradiation. Non-vaccinated animals, divided into 3 groups--one of them subjected to irradiation eleven times at a dose of 100 r.--had the same survival rate, whereas vaccinated animals, irradiated in the interval between vaccination and superinfection at a dose of 500 r. had nearly the same survival time as the non-irradiated. The radiation exposure did not damage the vaccination effect. Additional studies reveal that BCG- and virulent-strain-vaccinated animals even after a higher dose of radiation (800 r. 32-34 days before infection and 61-62 days after vaccination) demonstrated no diminished protection against tuberculosis. Vaccination (virulent and avirulent mycobacteria) before irradiation exposure (800 r.) was not radioprotective. Using smallpox, polio and measles vaccines and a combination of polio and BCG, it was shown that only smallpox vaccines have no injurious effect. There are also some indications that BCG-vaccine is of certain protective effect against radiation damage (550 r.). It might be possible that mixed vaccines show greater radiation protection than monovaccines. (Abstract supplied, modified)

1408
HOW NASSER USED POISON GAS. U.S. news & world report, v. 63, July 3, 1967: 60.
JKI.U65, v. 63

Observations by two members of the International Committee of the Red Cross medical mission to Yemen investigating the use of gas in Gahar, North Yemen, May 10, 1967. A medical examination of the corpses and four surviving victims as well as testimony by witnesses to the air raid indicate that toxic gas caused the deaths of the 75 victims by pulmonary edema. These findings are reported by the University of Bern Institute of Forensic Medicine, which hypothesizes the use of mustard gas.

1409
Kennedy, William V. CB DEFENSE OF THE FIELD ARMY. Ordnance, v. 51, Mar./Apr. 1967: 522, 524, 526, 528, 530. UF1.O67, v. 51

The best defense against chemical and biological [CB] attack is destruction of the enemy's laboratories, factories, and storage depots before he can distribute and use the agents. This is nearly impossible with biological weapons, however, due to their microscopic size and the ease with which they can be pre-positioned and released. The fear of biological warfare is a weapon itself when exploited by rumor and propoganda, and must be combated with good troop indoctrination designed to convince the individual soldier he is capable of protecting himself. The Army trains and equips its soldiers with detection devices, protective equipment, and decontaminants on the assumption that chemical weapons may be employed in future conflict. Protective masks, for example, are issued throughout the Army, and considerable attention in basic training is given to their use and care. In May 1966 the Defense Department announced that the Army is working on the development of a combat uniform with permanent protection against chemical and biological agents. As the individual soldier cannot carry all the equipment needed to cope with the CB threat, units are equipped with warning devices, chemical-agent detection kits, and other essential equipment. Once the attack stops, units can employ decontaminants to clear the area. The lack of use and seemingly remote nature of chemical and biological weapons have generated indifference on the part of the troops, who tend to regard the protective mask as more of a nuisance than an asset. In the event of CB attack the strain of constantly wearing protective masks and clothing and the continual hazards of contaminated surroundings will exhaust and depress the troops and necessitate constant troop rotation.

1410
Larson, Carl A. BIOLOGICAL WARFARE: MODEL 1967. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 46, May 1966: 31-39. Z6723.U35, v. 46

Although there can be little danger of scientists devising a lasting "secret" weapon in biological warfare, breakthroughs in basic research coupled with advanced industrial production methods could introduce a factor of surprise in the strategic military use of biological agents. Researchers are interested not only in isolating infectious microbes, but also in modifying toxic agents to counter existing defenses. Laboratory techniques for the latter purpose include production of artificial mutations by exposing microbes to chemical agents or combining the deoxyribonucleic acid [DNA] molecule, which is the primary carrier of genetic information, with agents causing change at the moment of duplication; modification of microbes through transfer of generic information from another microbial strain by means of the union of two bacteria, transformation of the DNA from one molecule for combination with the DNA of another, or inoculation of the DNA factor into bacteria by a virus attack; and examination of the structure of DNA and ribonucleic acid [RNA] molecules via cryptanalysis to devise methods for artificial production. Biological agents can be disseminated by aerosol devices or baterial cultures in food and drinking water. They can be used against key government groups, over ground areas to limit military operations, in key manufacturing districts, and against troop concentrations and population centers. Defenses against biological warfare include immunization, stockpiling of antibiotics, and early detection of infectious agents. Also, the adversary may not use such weapons out of a feeling of responsibility to mankind or fear of retaliation in kind.

1411
Miller, Lloyd G. THE USE OF CHEMICALS IN STABILITY OPERATIONS. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 46, Dec. 1966: 43-47. illus.
Z6723.U35, v. 46

The number of casualties in South Vietnam could be minimized if the U.S. Army and its allies would use riot control chemicals (CN, CS, DM). The use of these chemicals would prevent the needless killing of women and children suspected of sheltering Vietcong in villages and caves, and save the lives of many Americans who track the enemy in such areas. Alternately, the use of chemicals to defoliate the dense jungle area around military installations and main highways vital to troop and supply movements would prevent enemy ambushes--within the past year defoliated areas have shown a remarkable decrease in the number of enemy ambushes and sabotage. The use of non-lethal gas in all phases of war would be impossible due to many variables--weather, wind, humidity, etc. However, when gas is used, troops should be available to move immediately into the area to take prisoners.

1412
Pusch, W. M. [ESTIMATION OF INTERNAL STRONTIUM CONTAMINATION FROM URINE EXCRETION RATES] Abschätzung einer internen Kontamination mit Strontium aus den Urinausscheidungsraten. Atomkernenergie, v. 11, Nov./Dec. 1966: 503-507.
QC770.A8, v. 11
Bibliography: p. 507.

A number of authors have derived formulae explaining the mechanism of strontium excretion from individuals observed after acute intake. In this report an attempt will be made to find out how closely these formulae agree. A mean urine excretion curve will be selected, which should be the most suitable curve to describe the metabolism of strontium from any person. Furthermore some proposals will be made concerning the procedures to be followed after internal contamination to get the most suitable information for body-burden calculation. Finally methods will be explained for assessing the strontium exposure dose from urine excretion data. (Abstract supplied, modified)

1413
Reissig, H. [EMPIRICAL FACTORS FOR EVALUATING THE CONTAMINATION OF AGRICULTURAL PLANTS WITH RADIONUCLIDES FROM THE WORLD-WIDE FALLOUT FROM NUCLEAR WEAPONS EXPLOSIONS] Empirische Faktoren zur Abschätzung der Kontamination landwirtschaftlicher Nutzpflanzen mit radioaktiven Spaltnukliden under den Bedingungen des weltweiten Fallout von Kernwaffenexplosionen. Kernenergie, v. 10, Apr. 1967: 131-137. tables.
QC770.K4, v. 10
"Communication of the Institute for Soil Science and Ecology, Technical University, Dresden."

Probable contamination of agricultural plants can be calculated when fallout intensity or ground contamination is known. Empirical factors for estimating strontium-90 contamination were calculated from data on contamination of agricultural plants on the territory of the German Democratic Republic during the period from 1960 to 1963. Total fallout contamination factors were calculated from the averages of fallout intensity, ground contamination, and uptake by the roots.

1414
Robbins, Jacob, Joseph E. Rall, and Robert A. Conard. LATE EFFECTS OF RADIOACTIVE IODINE IN FALLOUT: COMBINED CLINICAL STAFF CONFERENCE AT THE NATIONAL INSTITUTES OF HEALTH. Annals of internal medicine, v. 66, June 1967: 1214-1242. illus.
R11.A84, v. 66

The presence of radioactive isotopes of iodine in fallout from atomic explosions is well known. In the accidental exposure of the inhabitants of one of the Marshall Islands after a fusion-type explosion in 1954, thyroid radiation from radioiodine, particularly in the children, was sizable. This resulted in the late development of thyroid insufficiency or thyroid nodules or both in 80% of those children exposed at less than 10 years of age. At the present time, the thyroid effects constitute the only important overt medical problem in the exposed population. Detection of thyroid damage was hindered by its insidious onset and by the unexpected occurrence of elevated blood levels of iodoprotein in the Marshallese population. The greater prevalence of thyroid abnormality in the children is probably due to two factors: a larger radiation dose due to small thyroid size and greater likelihood of the growing organ to manifest changes resulting from chromosomal alterations. The spectrum of radiation exposure of the thyroid glands in any population is very wide, ranging from stratospheric fallout from atomic explosions and clinical testing with radioiodine isotopes to high radiation rates intentionally produced in therapy of thyroid diseases. The Marshall Island experience will help to define the range in which significant thyroid damage may occur. (Abstract supplied)

1415
Sens, G. [BIOLOGICAL EFFECTS OF NEUTRON RADIATION] Die biologische Wirkung der Neutronenstrahlung. Zeitschrift für Militärmedizin, v. 8, Feb. 1967: 27-30. tables.
P&GP RR

Investigates the reactions in matter, particularly in living tissue, caused by neutron radiation--a component of instantaneous radiation produced by small-caliber nuclear weapons. Sens discusses the "interaction of neutrons with their biological media" and relative biological effects of the thermal, epithermal, medium energy, and fast neutrons. He considers also the dosimetry of, and protective measures against, the radiation from small caliber nuclear weapons.

1416
Volchok, H. L. STRONTIUM-90 DEPOSITION IN NEW YORK CITY. Science, v. 156, June 16, 1967: 1487-1489. Q1.S35, v. 156

Measurements of strontium-90 deposited in New York City over the past 12 years make for broader understanding of the fallout phenomenon. The data indicate a stratospheric half-residence time of 8 to 10 months. The seasonal oscillation of strontium-90 fallout is very symmetrical and consistent from year to year and completely independent of the timing and magnitude of nuclear tests. The predicted fallout of strontium-90 in 1970 is less than 1 percent of that during the peak year 1963. (Abstract supplied)

1417
Wilson, A. R., and F. W. Spiers. FALLOUT CAESIUM-137 AND POTASSIUM IN NEW-BORN INFANTS. Nature (London) v. 215, July 29, 1967: 470-474. Q1.N2, v. 215

New techniques of low background counting have made possible the measurement of intake and retention of natural potassium and caesium-137 in infants. The biological half-lives of both potassium and caesium-137 are from 5 to 10 times lower than the corresponding values in adults. (Abstract supplied)

1418
Zaidi, Ali Nasir. RADIATION HAZARD. Science chronicle, v. 5, Dec. 1966: 21-24.
Q1.S368, v. 5

The advent of nuclear weapons has focused man's attention on the varied and extensive damage that radiation can do to all living organisms. Radiation disrupts and destroys the delicate electrochemical balance in the molecules of the body, causing serious injury or death. In an attempt to find an effective treatment for radiation injuries, scientists have carefully studied Japanese who were exposed to radiation at Hiroshima and Nagasaki and individuals who were hurt in radiation accidents. Since radiation destroys the white blood cells that normally check infection, blood transfusions and antibiotics have been used to combat these symptoms. Radioactive material from an atmospheric explosion rises to 30,000 to 60,000 feet, where it becomes diluted with uncontaminated air, but as it moves with the prevailing winds, injury-causing fallout of radioactive material can occur. The amount of fallout varies directly with the height of the explosion. In the case of underwater explosions, some of the gamma rays and neutrons are absorbed by the water, but radioactive fission products rise in a cloud that can disseminate these dangerous materials over an extensive area.

2. Economic

1419
[EVOLUTION OF FRENCH POLICY IN 1966] Évolution politique de la France en 1966. Chronique de politique étrangère, v. 20, May 1967: 307-336.
D839.C82, v. 20

Outlines France's space and nuclear programs, foreign and domestic policies, and its relations with fellow members of the Atlantic alliance. Although France has taken steps towards the creation of an effective nuclear military force, it has failed to establish a sophisticated civil nuclear reactor program--only 1 percent of its electrical energy is nuclear powered. The French Atomic Energy Commission has recently expanded its civil nuclear program to include an advanced fast-breeding reactor.

1420
Fischer, Karl. [THE NONPROLIFERATION TREATY ISN'T THE ONLY THING THAT ENDANGERS THE WEST GERMAN ECONOMY] Nicht nur der Atomsperrvertrag gefährdet die deutsche Wirtschaft. Wehr und Wirtschaft, v. 11, Apr. 10, 1967: 202-204.
U3.W38, v. 11

Criticizes the West German Defense Ministry's policy with regard to arms procurement and defense contracts. Fischer blames Bonn for surrendering West German research and development interests to the United States and examines the long-range economic effects of such a policy.

1421
General Electric Company. Re-Entry Systems Dept. UTILIZATION OF AEROSPACE AND DEFENSE TECHNOLOGY TO STIMULATE ECONOMIC GROWTH. Philadelphia, 1965. 19 p.
HD9711.5.A2G4

Uses three criteria--economic effectiveness, acceptability, and feasibility--to evaluate various methods of stimulating economic growth. To determine the effects of the interaction of the three elements, the study develops a decision model and attempts to apply it.

1422
Hennig, Eike. [ARMAMENT SOCIETY AND ITS COSTS] Die Rüstungsgesellschaft und ihre Kosten. Atomzeitalter, no. 6, June 1967: 296-308.
P&GP RR

Reversing Clausewitz' definition of war, one must consider politics as "a continuation of war with an admixture of other means." War has become an integral feature of world politics and this fact has important consequences for the socioeconomic systems of the world. The Soviet-American nuclear stalemate, a product of the relative weaknesses of the American and Soviet systems, is likely to last a long time. These weaknesses prompt the call for "active coexistence,"

preserve "the cold peace" between the two antagonistic industrial civilizations, and in effect stabilize the position of each system's elite. The weakness on the American side consists of an ever present danger of overproduction. On the Soviet side permanent underproduction is perpetuated by the Soviet Union's military and political competition with the West. In the meantime the relations of leading industrial states (including the Soviet Union) with the Third World become increasingly counterproductive to "active coexistence" based on equal partnership between both groups, despite the obvious value of such coexistence to world peace. In the capitalist system a nation's armaments policy allows it to underwrite market expansion in key industries and prevent changes in the socioeconomic structure of the nation. In the Soviet Union armaments expenditures serve the latter purpose by necessitating "consumer goods renunciation." Thus the existing power relations in both systems and in the world are stabilized by armaments. In the year 1966-67, world expenditures for armaments amounted to $136 billion, $58 billion of which was spent by the United States and $35 billion by the Soviet Union.

1423
Jacquet, Edward M. WHAT WE ARE DOING WITH SURPLUS ICBM COMPLEXES. Air university review, v. 18, Mar./Apr. 1967: 88-94. illus.
TL501.A5574, v. 18

The United States is saving from its salvage and sales of surplus strategic-missile facilities. For example, 216 surplus Titan and Atlas missiles have been stored for use as suborbital boosters in subsequent research and development projects. Several complexes have been retained for future Government use. Such equipment as power plants are being rebuilt for use in Vietnam. The Government is expected to save $250 billion over the next 5 years from missile redeployment.

3. Ethical and Social

1424
Booth, Alan R. CHURCH AND SOCIETY: A DISARMAMENT ASPECT. Disarmament, no. 13, Mar. 1967: 9-12.
JX1981.P7D5, 1967

The Church is often expected to provide guidance on the crucial human questions of war and peace, but opinion differs on the form this guidance should take. The Church could advocate its own detailed disarmament proposals, but there is no simple way to derive political policies from the Christian gospel, and attempts in this direction misconstrue its purpose and meaning. On the other hand, it is equally ineffective for the Church to make platitudinous pronouncements of general principles. The Church does not bring political expertise to disarmament discussions but instead certain fundamental commitments: a basic humanism, Universalism, and a scepticism about historical utopianism. Because a variety of political views can exist within a church, and because disarmament policies are not necessary derivatives of Christian faith, the World Council of Churches has given its Commission of the Churches on International Affairs a high degree of autonomy. The Commission's proposals to date, while neither startling nor original, do represent a sober assessment of world affairs. A fruitful area for further discussion is the role of Christians in creating a commonly accepted "international ethos" upon which common institutions can be built. The recent and much-lauded Conference on Church and Society underlined the need to promote peace through international structures, beginning in less sensitive areas and gradually moving into areas of political conflict and security.

1425
Hanunian, Norman. DIMENSIONS OF SURVIVAL: POSTATTACK SURVIVAL DISPARITIES AND NATIONAL VIABILITY. Santa Monica, Calif., Rand Corp., 1966. 214 p. (Rand Corporation. Memorandum RM-5140-TAB)
Q180.A1R36, no. 5140
"Research . . . sponsored by the San Francisco Operations Office of the U. S. Atomic Energy Commission under contract AT(04-3)-414."

A statistical analysis of the possible "compositional changes that massive nuclear attack might produce in America's societal structure." Projected attack patterns indicate wide regional variations in impact. People at either extreme of the life span would probably have little chance of surviving, as would urban residents. High-income families also have a low projected survival rate. A model was constructed that, it was hoped, would provide some indication of the viability of the farm sector, which apparently would present no specific problem in the postattack viability of the United States.

1426
Harrigan, Anthony. ARMIES AND INNER LEADERSHIP. In U. S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, Jan. 1967: 21-28. illus.
Z7623.U35, v. 47

Armed forces of modern states represent a socially constructive element in the life of a nation. The belief that the military is represented by "trigger happy" and "warmongering" officers and soldiers is dispelled by our heritage. Many professional soldiers have served in high government positions. This form of criticism is an attempt to ostracize the military from our society. The historical lesson of the military vis-a-vis society from the time of Alexander the Great is proof of the military's cohesive rather than detrimental effect on society. The reconstruction of Germany and Japan after the Second World War is an example of the many military programs designed to aid societies. In advanced states where the armed forces are subordinate to civilian authority the role of the military may be in specific civic action groups (flood control, etc.). In poorer countries, the military role is so essential to the maintenance of a stable society that its liquidation would result in the downfall of governments. The military protects society not only from the external threat of invasion but from the internal threat of subversion. By its indoctrination of troops, the military instils a code of behavior based on strict moral discipline and good citizenship, which provides a guide to the duties of manhood and ends the alienation of youths from society.

1427
Hartigan, Richard S. NONCOMBATANT IMMUNITY: REFLECTIONS ON ITS ORIGIN AND PRESENT STATUS. Review of politics, v. 29, Apr. 1967: 204-220.
JA1.R4, v. 29

According to current interpretation of the just war theory, intentional slaying of the innocent, or noncombatants, renders the conduct of the war unjust. Thus the use of nuclear weapons, which are almost totally incapable of discriminating between military and civilian elements of the population, is viewed as morally proscribed. Yet the history of civilian immunity, taken for granted by many, indicates that there is no absolute moral prohibition against harm being inflicted on noncombatants. St. Augustine, the "founder of the Christian just war doctrine," took cognizance of the possibility that innocent members of enemy populations might be slain. The just war theory of St. Thomas Aquinas was not concerned with the actual conduct of the war, but his principle of "double-effect" states that if an act has simultaneous good and evil effects, if the evil does not heavily outweigh the good, and if the act's good effect is intended, then the act is morally permissible. This principle clearly implies that in the pursuit of a just war the innocent could be slain along with the guilty so long as only the guilty were killed intentionally. Moreover in the thinking of both Aquinas and Augustine the guilt of the enemy was a subjective kind of wrongdoing--the intent to violate God's will--and had little to do with aggressive acts such as the actual waging of war. Only in the modern era did the prohibition against intentional slaying of the innocent evolve into the principle of noncombatant immunity. The so-called "Peace of God," which in medieval times specified classes of society against which military attacks must not be made, did not derive from moral theology but rather represented an attempt to limit the bloodshed that characterized the era. Now the controversy over nuclear weapons appears to have only two extreme alternatives: either nuclear weapons over a given size may not be used on population centers, or the necessity to maintain the civitas can be taken to obviate all other moral laws. Yet if the principle of noncombatant immunity is regarded in historical perspective it can be seen that it is not, after all, a moral imperative, and that some third, more viable alternative can be derived. Noncombatants are not identical with innocents, and practical procedures for di stinguishing them must be defined if there is to be a position between total pacifism and moral cynicism.

1428
Niebuhr, Reinhold, and Hans Morgenthau. THE ETHICS OF WAR AND PEACE IN THE NUCLEAR AGE. War/peace report, v. 7, Feb. 1967: 3-8.
P&GP RR

Considers the role of ethics in contemporary questions of war and peace. Niebuhr argues that man himself has a moral nature, but that the community can attain no higher standard than "wise self-interest." Morgenthau feels that nations and communities have a moral nature above the purely practical considerations governing their actions. Together they discuss a number of important international problems including the United Nations, Vietnam, and prospects for world peace.

1429
Saunby, Robert. THE ETHICS OF BOMBING. Air Force and space digest, v. 5, June 1967: 49-50, 53.
UG633.A65, v. 5

Aerial bombardment, which since 1911 has been one of the most effective and terrifying weapons of war, is legitimate if it genuinely furthers the aim and the main strategic concept of a war. The killing of civilians for revenge does not come under the concept of strategy and does not help win a war. Although bombing involves innocent civilians during wartime, it has in the long run saved many lives by preventing the need for large ground campaigns. The defensive bombing of North Vietnam is both moral and ethical. Its objective is to diminish the enemy's power by destroying his industrial areas, power plants, dams, and railway stations.

1430
Somerville, John. DEMOCRACY AND THE PROBLEM OF WAR. Humanist, v. 27, May/June 1967: 77-80.
B821.A1H8, v. 27

To deal with the technical capabilities of thermonuclear weaponry man has had to invent a new term, biocide, designating the obliteration, with one blow, of all forms of plant, animal, and human life. The nuclear age has opened innumerable new moral questions; for example, whether the traditional distinction between just and unjust war can exist in the face of total annihilation. While war is not an activity of individuals as individuals but as part of a sovereign state, it can be waged only if individuals are willing to participate. It is a matter between man and his conscience; it is not a phenomenon beyond his control. Government without consent of the governed is possible, but war without consent of the warriors is not. Modern democratic philosophy is explicit in proclaiming that ultimate authority rests with the people over their government, not with the government over its people. Man has a right to choose death over life for himself, but he has no right to make that choice for others. War represents a matter of life and death for humanity, and yet contemporary democracy has not been able to apply the concept of majority decision to the question of war.

1431
Walzer, Michael. MORAL JUDGMENT IN TIME OF WAR. Dissent, v. 14, May/June 1967: 284-292.
HX1.D58, v. 14

At some point in war the methods used to promote a political goal conflict with the more general purpose of maintaining the moral standards and survival of international society. There are limits to what man can do in wartime, even if he is convinced he is pursuing justice, and these limits must be reevaluated in each new conflict. Military decisions are reciprocal; each side feels it must do whatever the other side does or might do. However, sometimes one side is a great deal more powerful and therefore unrestrained by fear of retaliation by the other. While soldiers can never be blamed for taking advantage of superior strength, war escalated too far can transgress limits useful to humanity in setting precedents for future wars. The concern about brutality in wartime is for noncombatants; it is generally recognized that nearly anything can be done to combatants, whose business is to kill others until killed themselves. However, modern military technology makes it difficult to limit damage to strictly military personnel and installations. Guerrilla warfare poses special problems in this respect, for any effort to destroy a guerrilla movement with a fair degree of popular support involves some killing of civilians. Part of a guerrilla movement's effectiveness stems from the moral decisions it places on its stronger enemies to

either give up the fight or accept responsibility for actions condemned by public opinion. Usually it is better to give up the fight. Some would argue that the side fighting a "just war" has greater latitude in choosing its means and that "sticking to the rules" may be less important than winning. However, both sides generally claim their cause is just. War is never an end in itself, but instead a desperate wager that things will be better when it is over. Unlimited violence, whatever its immediate effects, compromises the future. While in certain situations the end might justify the means, brutality in war must never become a settled policy.

4. Other

1432
ARMS CONTROL MAY DOOM SOME RESEARCH PROGRAMS. Washington science trends, v. 18, Apr. 10, 1967: 7. T1.W3, v. 18

The Administration's efforts to achieve a treaty limiting the proliferation of nuclear weapons are likely to affect a number of advanced technology projects, including Plowshare, a program for using nuclear explosions for peaceful purposes; Harp, a U.S.-Canadian program in which naval guns are used to place satellites in orbit; and Centrifuge, a process for the separation of isotopes that could lead to "cheap" atomic weapons. While peaceful nuclear explosions have many uses, they have long been opposed as a biological and ecological hazard and as a means of spreading weapons technology. Official spokesmen acknowledge that reductions in the Harp and Centrifuge programs are being made--at a time when they are just beginning to show progress.

1433
Carter, Luther J. MISSILE DEFENSE: LBJ'S BID TO CURB ARMS RACE GAINS SUPPORT. Science, v. 155, Mar. 31, 1967: 1651-1654. Q1.S35, v. 155

Seeking to avoid an upward spiraling of the arms race, President Johnson has enjoyed bipartisan support for his proposal to negotiate a treaty with the Soviets to limit U.S.-Soviet deployment of an antiballistic missile [ABM] defense system. Unless such a treaty includes provisions for on-site inspection and excludes agreements to limit the U.S. strategic-weapon advantage, it will be subject to Congressional defeat, and the debate over U.S. deployment of the ABM will be renewed. "Cold war hardliners" such as Senators Richard Russell of Georgia and Strom Thurmond of South Carolina back an ABM system designed to protect missile sites and 50 major cities. Secretary of Defense Robert McNamara believes such a system would only encourage a corresponding buildup by the Soviets of offensive weapons and suggests instead that the United States strengthen its deterrent with increased penetration capabilities and deploy only a light ABM system, if any. Since the majority of voters have not yet joined the controversy, the political pressure on the administration for development of the ABM remains light. In spite of the financial boon (from $1 to $2 billion yearly) an ambitious ABM project would represent to communities and industries, voting patterns tend to invalidate the "merchants of death" theory for ABM support. Thus whatever the outcome of the Soviet talks President Johnson will be able to evaluate the issues regarding U.S. deployment of an ABM system relatively free from political and industrial pressures.

1434
DOUBTS RISE OVER NIKE-X PRODUCTION COMMITMENT NOW. Aviation week & space technology, v. 86, Mar. 6, 1967: 112-113, 115. illus. TL501.A8, v. 86

Analyzes the decision to postpone production of the Nike-X missile, mainstay of the antiballistic missile [ABM] defense system. Primary reasons for the postponement are hopes of reaching an agreement with the Soviet Union limiting the deployment of ABM's and McNamara's conviction that advantage in a strategic balance is maintained by offensive-missile superiority. Even if the United States has counteroffensive-penetration superiority some military leaders who believe that the Nike-X is more advanced than any Soviet defensive weapon are in favor of ABM deployment. The author also discusses the complex integral components (digital computer, TACMAR radar system, etc.) of the Nike-X system.

1435
Fink, Donald E. POLITICS ALTER GERMAN AIR FORCE PLANS. Aviation week & space technology, v. 86, Apr. 3, 1967: 35-36. TL501.A8, v. 86

Outlines plans for the reorganization of the West German Air Force. In addition to its operational prerequisites, such economic and political factors as the reevaluation of NATO necessitated by indications of an East-West détente, the recent freedom acquired by Germany to purchase military equipment within the European community, and the need to bolster the depressed German aircraft industry by granting it 50 percent of aircraft production affect reorganization programs. Plans for conventional aircraft include restocking and improving the efficiency of the Starfighter and replacing Germany's close-support aircraft Fiat G-91 with a suitable American or European model, possibly the Anglo-French Jaguar. German defense officials are studying three classes of rotary wing aircraft, including helicopters for division-level troop transport, medium-level troop transport, and for observation purposes and other light tasks. Final decisions for restructuring the Luftwaffe cannot be made until the role of the Starfighter in NATO defense is defined. In order to increase the conventional-strike power of NATO, the Starfighter's mission may be converted from strategic-nuclear operations to interception and reconnaissance activities.

1436
Fox, Clifton C. TURKISH ARMY'S ROLE IN NATION-BUILDING. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, Apr. 1967: 68-74. Z6723.U35, v. 47

The Turkish Army has played a significant role in the economic, social, and political development of Turkey. Through literacy programs, foreign language courses, and technical training programs, the Army broadens the social outlook of the conscript and equips him with technical skills useful in civilian life. Not only do military installations bring cultural opportunities to rural areas, but the Army also encourages the fusion of population groups by training draftees from urban areas in rural areas and draftees from remote areas in the cities. In addition to economic

development projects such as road building and reforestation, the Turkish Army has performed a valuable function in developing national pride and responsible citizenship. Although the Army provides administrative talent for the Government, it has generally remained neutral in political affairs, aside from umpiring disputes between competing political factions. "The success of the Turkish Army as a nationbuilding institution suggests that military predominance within developing countries is not necessarily a condition to be feared and avoided."

1437
Gibbons, M. G. TRANSMISSIVITY OF THE ATMOSPHERE FOR THERMAL RADIATION FROM NUCLEAR WEAPONS. San Francisco, U.S. Naval Radiological Defense Laboratory, 1966. 48 p. (U.S. Naval Radiological Defense Laboratory. Technical report USNRDL-TR-1060)
AD 641481.
L.C. copy on microfiche.
Sci RR

Gives directions for calculating the transmissivity of the atmosphere for thermal radiation from a nuclear weapon burst of any yield and height and lists sets of atmospheric and surface albedo conditions. The directions are relatively simple and assume "the availability of only standard descriptive and quantitative information (e.g., cloud types, cloud base heights, surface visibility) that is ordinarily recorded at airport weather bureau stations. . . . For nuclear weapon bursts with effective fireball heights (for thermal radiation) of less than one-quarter mile the transmissivity of the atmosphere . . . is given in terms of a formula involving visibility and based on experiments carried out by the author."

1438
Gjessing, Gutorm. ECOLOGY AND PEACE RESEARCH. Journal of peace research, no. 2, 1967: 125-139.
AS9.J6, 1967

Starting with Johan Galtung's 'Structural theory of aggression,' the article emphasizes the ecological background of conflicts, particularly conversion of energy through plants and animals. The role of the horse is dealt with more extensively and exemplified by pastoral nomads, Plains Indians, etc. Group conflicts seem to be concomitant to the introduction of new mechanisms of conversion of energy. One of the most striking characteristics of industrialism is precisely the constant and strongly accelerating stream of new methods of converting energy. 'The white race' has been considered beyond comparison the most warlike of all 'races,' and there is much evidence to suggest that its warlike traditions lead back even to the earliest Indo-European migrations in Late Neolithic time and the Bronze Age. As the acquisition of new instruments of conversion of energy seems to promote belligerence--whereas again war means an enormous stimulus to technological development--the 'output-feedback-input' model probably should be applicable to the study of war. Since war is a structural phenomenon apparently endemic in Western industrialized countries, their structures, and accordingly their values, have to be changed in correlation to inter-state structures in the direction of social and economical equality. This would mean values which make for cooperation rather than rivalry; creative, constructive activity instead of aggression. (Abstract supplied, modified)

1439
Hosmer, Craig. CAN U.S. SURVIVE RED H-BOMBS? U.S. news & world report, v. 63, July 31, 1967: 60.
JK1.U65, v. 63

A scenario demonstrating the possible effects of a Soviet attack on the United States with just 18 "terror" bombs--nuclear bombs of 100 megatons. Representative Hosmer, a member of the Joint Committee on Atomic Energy, feels that the U.S. reliance on more but smaller weapons rather than such superweapons may be an error. In his scenario, the 18 100-megaton weapons produce a nationwide firestorm and kill 3 out of every 5 Americans. In the account one survivor says "The Secretary [of Defense Robert McNamara] miscalculated."

1440
Hunter, Robert E. THE UNITED STATES AND ANTI-BALLISTIC MISSILES. World today, v. 23, May 1967: 177-179.
D410.W63, v. 23

McNamara's statements that antiballistic missile [ABM] defense systems may threaten American security by stepping up the arms race have persuaded some strategists, but have failed to impress many Congressmen, military leaders, and a large portion of the American public. The reasons are clear. It is difficult to persuade the American public that defenses, even if they are not really defenses, weaken national security and may lead to a reckless foreign policy or war. Also, American numerical missile superiority over Russia seems to have lost some of its "effectiveness" as a result of the Soviet ABM, and the Vietnamese War has clouded the whole issue of the ABM. In terms of long-range strategy and objectives the ABM debate is far more crucial than the Vietnamese War, and it will become one of the main issues in the 1968 election. A treaty to forestall construction of defensive weapons like the ABM would require mutual offensive parity, but this would be unacceptable to the United States, because its whole concept of strategic deterrence would have to be changed. On the other hand administration officials will find it difficult to persuade Congress and the public to place unilateral restraints on ABM deployment. In this case it is more important for the implications of ABM deployment to be made clear to the American public than to the Soviet leaders.

1441
Katz, Yale H. NUCLEAR WAR AND SOIL EROSION: SOME PROBLEMS AND PROSPECTS. Santa Monica, Calif., Rand Corp., 1966. 87 p. (Rand Corporation. Memorandum RM-5203-TAB)
Q180.A1R36, no. 5203
"Research . . . sponsored by the San Francisco Operations Office of the U.S. Atomic Energy Commission under contract AT(04-3)-414."
"References": p. 85-87.

As part of an extrapolation of the possible postattack environment of the United States, discusses the potential effects of thermonuclear war on soil erosion. Presumably the greatest effects will be the destruction of ground cover and the abandonment of human efforts to maintain the environment intact.

1442
Lowry, Ira S. THE POSTATTACK POPULATION OF THE UNITED STATES. Santa Monica, Calif., Rand Corp., 1966. 139 p. (Rand Corporation. Memorandum RM-5115-TAB) Q180. AIR36, no. 5115
"Research . . . sponsored by the San Francisco Operations Office of the U.S. Atomic Energy Commission under contract AT(04-3)-414."

From five simulated attacks on the United States, describes the postattack demography of the Nation. Population size, rate of growth subsequent to attack, composition by age, sex, and color, and postattack fertility and mortality patterns are examined.

1443
Martin, Laurence W. BALLISTIC MISSILE DEFENSE AND EUROPE. Bulletin of the atomic scientists, v. 23, May 1967: 42-46. TK9145. A84, v. 23.

The prospect of the United States' venturing onto another nuclear technological plateau by deploying an antiballistic missile [ABM] system has engendered a serious debate between the United States and its European allies--a debate that revolves around the strategic implications that an ABM system would have within the context of U.S.-Soviet relations on Europe's strategic defense. Europeans tend to regard any response to Russia's ABM system as "destabilizing." They believe that it "exacerbates U.S.-Soviet relations with unreal considerations of strategic advantage or disadvantage." They regard the deployment of an ABM system to counteract the Chinese threat as an attempt by the administration to hide the real threat--the Soviet Union. They believe that the United States commitment in Europe is weakening and that Washington is "purchasing security in Asia at Europe's expense." The deleterious effect an ABM program would have on U.S.-Soviet relations, and in turn on European security, has been exaggerated by some European leaders. It is clear that a symmetrical response by the United States to Russian ABM deployment would not be viewed as a threat. However, patterns of escalation could result from fear that the other side had achieved a strategic advantage. Whether an arms race could disturb diplomatic relations between the Great Powers cannot be determined by examination of the interrelationship of diplomacy and technological innovation. Future escalation may be the result of "self-contained dynamics of technology rather than diplomatic events." Should the United States decide to react to the Soviet defensive buildup, Europeans in general would rather see the United States respond with a limited increase in offensive forces. However, substantial increases of this kind of armaments would cause European partners to question America's motives. To avoid this, an ABM response would be the better alternative, since it would be looked upon as a defensive rather than an aggressive move. Whatever policy the United States decides to pursue it is essential that European governments be consulted; interallied relations in the past have been strengthened by candid diplomatic intercourse.

1444
Pearce, Edward. THE COLD WAR AFTER TWENTY YEARS. Socialist commentary, July 1967: 27-29. HX3. S74, 1967

Historical analogy is dangerous when it prevents men from thinking empirically and forces events into the shadow of past happenings only loosely resembling the present. Man created World War II by fleeing the errors of World War I, and it would be ironic indeed if, through obsession with the causes of the Second World War, man should cause a third. Eternal addiction to historical analogy has prolonged the distrust and hostilities characterizing relations between East and West. Russia is "an intolerant, doctrinaire, paranoically suspicious, totalitarian oligarchy," but this should not concern the West. Peaceful coexistence requires neither respect nor admiration, but rather recognition that nations must survive and do business with one another on the basis of their own interests. To many Europeans such thoughts represent heresy, platitudes expounded from "an island in the Eastern Atlantic." Western Europe has vivid recollections of the years following World War II and is determined never again to tolerate a power vacuum in Central Europe that Russia can fill. Both Americans and Europeans must recognize that the cold war is two-sided. Stalin did not operate "like a fiend plotting continental domination"; he picked and chose what he could get, leaving aside what he considered dangerous, in an effort to establish a buffer to protect his nation. Any European who would help increase the holders of nuclear weapons in an attempt to ensure security based on 20-year-old circumstances is irresponsible. Nuclear weapons should be restricted to the Great Powers, who must strive to reduce their staggering military commitments. "Europe (and Mr. Heath) should realize that in nuclear power politics, three is a crowd, if not indeed a cloud."

1445
Rockett, F. C. MANAGEMENT REQUIREMENTS FOR CRISIS CIVIL DEFENSE PROGRAMS. Croton-on-Hudson, N.Y., Hudson Institute, 1966. 38 p. (Hudson Institute. HI-612-RR)
AD 642145.
L.C. copy on microfiche.
Sci RR

Discusses three implementation strategies in planning the management of crisis civil defense efforts. The author sees "managing crisis preparations for civil defense . . . as a major task," requiring peacetime preparations and considerable management flexibility.

1446
Russett, Bruce M. THE COMPLEXITIES OF BALLISTIC MISSILE DEFENSE. Yale review, v. 56, Mar. 1967: 354-367. AP2. Y2, v. 56

Technically, the outlook for the development of an antiballistic missile [ABM] is optimistic. The ABM would either utilize electromagnetic radiation to destroy the delicate circuitry triggering a thermonuclear warhead, or it would prematurely detonate the incoming warhead. Countermeasures such as rearrangement of complex weight ratios within the warhead to decrease its vulnerability and multiple or dummy warheads would also diminish the destructive power of each missile. Thus, an ABM system is effective in reducing explosive damage even though it may not be totally accurate. Opponents of the missile defense program emphasize its tremendous cost and argue that a strong capacity to survive an attack based on an ABM system and fallout shelters would appear to diminish restraint on a first strike action and upset

the current trend toward stable deterrence. Proponents of an ABM system view it as a means of restoring bipolarity by strengthening the invulnerability of the Soviet Union and the United States to the limited nuclear penetration capability of lesser powers. However, European nations may cooperate to form a united deterrent of their own rather than rely on U.S. protection. Also, regardless of the advantages of bipolarity, its loosening has led to the present tenuous atmosphere of detente. The danger implicit in U.S. development of an ABM system for protection against China is that it would dramatize our social and physical distance from non-Communist Asia, if it is not combined with provisions for the military protection of China's Asian neighbors. Thus the U.S. response to Soviet development of an ABM is complicated by many factors and should not be governed simply by the tendency to imitate or surpass Russia.

1447
Shulman, Marshall D. THE CRITICAL DECISION FOR MOSCOW. New leader, v. 50, July 3, 1967: 3-6.
HX1. N37, v. 50

Moscow is reaching a critical point in its decision on whether to give priority to the military or civilian sector of its economy. This decision will depend largely on Soviet assessments of the Johnson administration. Since 1965, Soviet-U.S. relations have been dominated by the Vietnam issue, leaving Moscow with an impression of increasing U.S. militancy and diplomatic isolation and intensifying the political rivalry between the two countries in various parts of the world. While the Vietnam conflict, the Soviet experience in the Cuban missile crisis, and the Chinese decision to develop nuclear weapons are all partial causes of the increased Soviet research and development efforts in military technology, the primary motivation of the Soviet leadership is to overcome U.S. strategic superiority as quickly as possible. The current arms equilibrium is likely to give way to a less stable relationship with much higher levels of expenditure unless both nations make a deliberate effort to prevent this. Antiballistic missiles [ABM's], penetration aids, better missile guidance systems, larger warheads, improved reconnaissance, and cheaper production of missiles and nuclear materials all encourage an accelerated arms race, while the promise of research breakthroughs inhibits agreements to level off military expenditures. The Soviets have also given special attention to that portion of the arms race related to local conflicts. They have watched with alarm the increase in U.S. limited-war capabilities due to Vietnam and are currently devoting special attention to their own development in this area. To date little progress has been made toward a moratorium on antimissile deployment or a limitation of strategic forces. The Soviet Union is unlikely to relinquish its present ABM installations in light of Chinese nuclear developments, although their usefulness in this situation is dubious. On the other hand, they have not moved toward massive ABM deployment. Both sides must make an effort to agree on an immediate across-the-board moratorium on production of strategic weapons, ABM's, and fissionable material while the details for balanced reductions in various categories are worked out. To slow the technological race and inhibit nuclear proliferation, efforts toward a comprehensive test ban should be renewed. While the public polemics and political rivalry between the United States and the Soviet Union will no doubt continue, common actions can be taken by both countries to slow the strategic arms race, reduce the risk of general war, and limit the flow of arms.

1448
Teller, Edward. DOLLARS VS. LIVES--A U.S. CHOICE [interview] U.S. news & world report, v. 62, May 29, 1967: 44-48. JK1. U65, v. 62

Dr. Edward Teller's views on antiballistic missile [ABM] defense, the risk of nuclear war, Chinese Communist nuclear capabilities, nuclear proliferation, and a variety of other topics. Teller sees ABM deployment as a means to counter nuclear blackmail by China and other small nuclear powers, and feels ABM's combined with blast and fallout shelters can protect 90 percent of the population against a sophisticated nuclear attack. Russia, not China, is one of the nation's greatest sources of danger, and "overconfidence, sluggishness, optimism, unpreparedness" the other. Teller does not believe the currently proposed nonproliferation treaty is enforceable; he believes that instead we must equip more nations with retaliatory weapons, but weapons that can be used for defense only. Defensive missiles can be programmed to explode only at a safe distance from the ground and only over the planned defended area.

1449
Tyrrell, Joseph V. NATIONAL FALLOUT SHELTER PROGRAM GETS NAVFAC ENGINEERING SUPPORT. U.S. Naval civil engineer and laboratory, Mar./Apr. 1967: 4-7, 45. illus. TA417. U6A32, 1967

Examines the diverse jobs undertaken by the Corps of Engineers and Naval Facilities Engineering Command (NAVFAC) in their engineering support functions for the Office of Civil Defense--a division of the Government that the President regards as an integral component of U.S. defense posture. The author notes a detailed survey by the East Central Division, a field office of NAVFAC, which describes the procedure for evaluating fallout shelters. The problems of evaluation involved in this survey--overestimation of apertures and weights--are now being realistically computed by an updating program, which samples results from the original survey and verifies erroneous conclusions. Other duties performed by NAVFAC include: inspecting shelters, receiving contracts for the Community Shelter Program, providing engineering service services for special projects in connection with the Emergency Broadcast System, and gathering detailed analyses of radiation protection afforded "Warning Points" without modification. In the future, according to the author, NAVFAC operations will expand to encompass protective construction in military projects as well as problems of radiation protection.

1450
THE WEIRD DEBATE ON ABM. Space/aeronautics, v. 47, Apr. 1967: 22-24.
TL501. A786, v. 47

The Johnson administration fears that deployment of an antiballistic missile [ABM] system will threaten the present stability of mutual nuclear deterrence. Washington has therefore assigned Ambassador Lewellyn Thompson to discuss this danger with the Soviets and

276-835 O-67—4

convince them that further Soviet ABM development will be countered by increased U.S. strategic-penetration capability. According to the "new nuclear logic" a strong ABM defense will embolden the owner by diminishing the destruction capability of the opponent's second-strike force. However, Secretary of Defense Robert McNamara favors U.S. deployment of a light ABM defense to protect American second-strike installations, to use against a possible Chinese attack or an accidental assault, and to provide a base for a stronger system if needed. Any final decision on the controversial issue of antimissile defense must await the outcome of Soviet-U.S. negotiations to limit ABM deployment.

1451
Zele, Daniele. MISSILES AND ANTI-MISSILES.
New republic, v. 156, Feb. 25, 1967: 16-18.
AP2. N264, v. 156

Technical, financial, and scientific problems will make administration officials think twice before they approve full-scale production and deployment of an antiballistic missile [ABM] defense system. The development of an effective ABM system is primarily based on the efficiency of an untested sophisticated interception system that includes a TACMAR radar network and long-range Spartan and short-range Sprint interceptor missiles. This interception system is designed to penetrate possible deceptions utilized by the enemy (decoys, metallized nylon balloons, and light metal strips) by attacking the incoming warhead along the third phase of its trajectory approach (reentry into the atmosphere), thus enabling the defensive radar to differentiate between the slower moving decoys and the real missile. Despite the presumed effectiveness of such a system the radioactive fallout from explosions at low altitudes would endanger the population. For this reason shelters (at a cost of $20 billion) would have to be built in the 20 principal cities of the United States. Even under these conditions hopes for survival would be slim. From an economic standpoint Washington would find a new defensive arms race easier to withstand than would Moscow. The present cost of an ABM system and the economic problems that confront the Soviet Union today preclude it from simultaneously developing such a system and sustaining its internal economy. In view of their relatively limited ICBM arsenal Russian strategists would do well to give strategic priority to deterrence rather than an ABM defense system.

III. INSTITUTIONS AND MEANS FOR THE MAINTENANCE OF PEACE

A. INTERNATIONAL LAW

1452
D'Amato, Anthony A. LEGAL ASPECTS OF THE FRENCH NUCLEAR TESTS. American journal of international law, v. 61, Jan. 1967: 66-77.
LL

In 1966 the French conducted a low-yield nuclear test series in French Polynesia and are expected to conduct hydrogen bomb tests there in 1967 or 1968. The question of the legality of these tests under international law--academic as it may appear now--is nonetheless important. Its answer, if based on an adequate international consensus, should exert a precedential influence on the determination of the validity of the conflicting interests involved in the tests. The almost universal acceptance to date of the nuclear test ban treaty would strongly indicate the existence of consensus on the illegality of the French tests, despite the fact that only Australia, New Zealand, Chile, and Peru, the nations whose interests have been directly threatened by the tests, lodged formal protests with France. According to McDougal's theory, the crucial test of legality is whether a nuclear test series constitutes "a 'reasonable' and 'minimal' incursion upon the traditional rights and claims of navigation and fishing associated with the 'free' regime of the high seas." The case of the American tests of 1954, which were conducted "on strategic Trust Territories" in the Pacific, can hardly be precedential for the French tests, because the French action lacks comparable support by other nations. Secondly, the very idea of nuclear tests' constituting a positive international law precedent is unreasonable because of the cumulative radiation effect of atmospheric tests on all kinds of life. Also, the legal status of the islands on which the American tests took place left no doubt whatsoever as to America's right under international law to use them for that purpose. France may argue that the Polynesian people's interests are not cognizable under international law as separate from France, because by a 1958 referendum the territory opted for membership in "the French Community of the Fifth Republic" instead of independence. Yet strong Polynesian protests against the French nuclear test (expressed, among others, by the President of the French Polynesian Territorial Assembly) may be viewed as invalidating the outcome of the 1958 referendum by force of the rebus sic stantibus principle. The tests represent a potential threat to the life and subsistence of the islanders. Taking this into account Polynesia may very well qualify as a "non-self-governing territory" as defined by the United Nations General Assembly (8th Session). Thus Polynesian interests would be internationally cognizable as separate from France's. Finally, assuming that the nuclear test ban treaty of 1963, due to its almost universal acceptance as well as to the past development of international law, indicates the existence in general international law of a customary norm prohibiting atmospheric nuclear tests, the French tests may be considered a violation of a universally valid, customary international law.

1453
Ferwerda, Vernon L. IS BLOCKADE AGGRESSION? Concern, v. 9, July 1-15, 1967: 7-8.
P&GP RR

Clearly the United Arab Republic has violated Israel's rights in the Gulf of Aqaba; but that this constitutes aggression, an act to which the appropriate response is military, is problematical. Although the United Nations has had a great deal of difficulty defining aggression, it has settled on some acts that are not aggression. Blockade of an international strait 100 miles from Israel falls into this category. International action in this case would protect the sovereignty of Saudi Arabia and the United Arab Republic and at the same time stress the right to peaceful transit of all states. A commercial advantage that would hasten agreement by the Arab nations involved might be to permit them to charge a small fee for transit through the Straits of Tiran.

B. INTERNATIONAL ORGANIZATION

1454
Bloomfield, Lincoln P. THE UNITED NATIONS AND U.S. FOREIGN POLICY. Rev. ed. Boston, Little, Brown [1967] 268 p. JX1977.2.U5B62

Partial contents--The United Nations and the national interest. --The United Nations and national security. --The United Nations and the superpowers. --Toward a more stable world. --The goal of world order.

Analyzes the United States' role in the United Nations. Bloomfield outlines reasonable policy goals for the United States in the next decade: world security, prevention of nuclear war, the survival of social and political values, the development of greater stability in international relations. Such problems as arms control and disarmament, nuclear proliferation, and strategic deterrence must be resolved before the goal of world order is attained. The author believes that the U.N. can be invaluable in providing pilot models for comprehensive agreements in arms control and disarmament.

1455
Burgelin, Henri. INTERNATIONAL STRUCTURES FOR A NUCLEAR AGE. Christian century, v. 84, June 7, 1967: 748-750. BR1.C45, v. 84

Realistic assessment of international organizations shows that sovereignty still rests with the nation state, and that any view of present structures as embryonic forms of world government or democracy is self-deluding. One important purpose of international organizations is to provide a forum in which diplomats can arrange nonviolent settlements of conflicts. While the smaller states can play a significant world role,

any international organization must recognize and account for disparities in power among nations. It must provide international society with norms governing the conduct of nations to prevent arbitrary actions that can arouse suspicion and provoke conflict. Its ultimate goal should be the transformation of society to bring about a fairer distribution of wealth. Rules must be devised to prevent exploitation of the underdeveloped nations by the more economically advanced. The main obstacles to formation of a genuine international society are commitment to the principle of national sovereignty and denial of the universality of mankind. Where they were once necessary, today national states have become a cause of incessant conflict and an impediment to the smooth operation of the world economy.

1456
Cousins, Norman. WHAT HAVE WE LEARNED? [editorial] Saturday review, v. 50, June 24, 1967: 20, 66. Z1219.S25, v. 50

Would Nasser have been willing to forgo surprise attack on Israel or exercise restraint at the point of military defeat and humiliation if he had had nuclear weapons at his disposal? Similarly, would Israel, faced with annihilation by Arab armies, have used nuclear weapons to preserve her existence? In 3 to 5 years these questions will no longer be hypothetical. The future of the human race may depend on a leader's willingness to see his country die rather than risk nuclear holocaust. The nations of the world must prevent the further spread of nuclear weapons and bring existing stockpiles under control immediately. The future of nonproliferation proposals is currently in the hands of men in circumstances that "incline them to possession and spread rather than reduction and control." Only strong public demand can impel a change in policy. It is also clear from recent events that the U. N. peacekeeping function cannot be separated from its peacemaking functions. The United Nations stopped Middle Eastern fighting in 1956, but it could not prevent war from recurring or guarantee the security of a nation that withdrew its forces. This separation between pursuit of peace and control of war in the U. N. Charter seriously undermines the organization's effectiveness. The United Nations must have machinery to underwrite the safety of individual nations and to enforce world law and justice. During the recent crisis Secretary General Thant was severely criticized for withdrawing U. N. peacekeeping forces at the exact moment they were most needed, but under the terms of the Charter he had no other choice. Its members must revamp the United Nations and endow it with powers sufficient to deal with the "root causes of war." "Sovereignty-minded statesmen" will not take the initiative in this area without an unmistakable demand from the people.

1457
Crane, Peggy. WHAT KIND OF UN? Socialist commentary, June 1967: 26-28. HX3.S74, 1967

To those who wish to see the United Nations as a world body capable of keeping order by imposing a collective will on nations, the organization will always be a failure; but it is also possible that despite its weaknesses the United Nations is charting a course which offers even greater promise to civilization. It is the United Nation's capacity to persuade and conciliate, not its ability to enforce compliance, that offers greatest promise. Its strength lies in its role as an impartial and neutral body in disputes, seeking to dampen tempers or, where necessary, interposing troops between belligerents. While some may argue that U. N. intervention often freezes a situation and prevents permanent settlement, others recognize that in many disputes neither side is completely right, U. N. enforced solutions are not necessarily just, and problems often become easier to resolve as events change. The United Nations was never intended to force changes within a country (these must come from internal pressures), but it can act as a forum of world opinion in influencing attitudes in many fields. From this point of view, the United Nations has achieved far greater success than its critics give it credit for.

1458
Gordenker, Leon. THE UN SECRETARY-GENERAL AND THE MAINTENANCE OF PEACE. New York, Columbia University Press, 1967. 380 p. (Columbia University studies in international organization, no. 4) JX1977.8.S4G6

Studies the changing role of the U. N. Secretary General and the various incumbents' influences on the organization's involvement in peace and security affairs. Gordenker concentrates mainly on issues involving the use or near use of armed force and avoids discussing such long-term U. N. efforts as arms control or economic development. The study is divided into four parts: concepts of the office of Secretary General, its routine and representational functions, its political functions, and its peacekeeping activities.

1459
Nanda, Ved P. THE UNITED STATES ACTION IN THE 1965 DOMINICAN CRISIS: IMPACT ON WORLD ORDER--PART II. Denver law journal, v. 44, spring 1967: 225-274. LL

Discusses U. S. action in the 1965 Dominican crisis in terms of the charters of the United Nations and Organization of American States. Nanda maintains that unilateral intervention in an essentially internal conflict cannot be justified as a legitimate self-defense measure. He analyzes the trend toward greater reliance on regional and universal organizations in dealing with conflicts, and sees the U. S. action in the Dominican crisis as an attempt to counteract this trend. He concludes with the recommendation that nations formulate procedures to limit the use of force to regional and universal organizations, rather than to individual nation-states.

1460
U. N. IN TROUBLE: ANOTHER DREAM SHATTERED? U. S. news & world report, v. 62, June 12, 1967: 37-39. JK1.U65, v. 62

With its failure to fulfill its peacekeeping function, the United Nations appears to be following the course of its predecessor the League of Nations. Handicapped by financial difficulties, a weak Secretary General, a Security Council crippled by the Soviet veto, and a General Assembly majority composed of a pro-Communist, Afro-Asian group that repeatedly attacks the Western democracies, the United Nations has a sketchy history in enforcing the principles of collective security in world trouble spots. World opinion reflects dissatisfaction with the failure of the United Nations to forcibly intervene against aggression during the last 21 years in all but 4 situations--Korea, the Middle

East during the 1956 Suez crisis, the Congo, and Cyprus. Now, confronted by the responsibilities of the Vietnam War, the United Nations will undergo the ultimate test of its capacity as a peacekeeping organization.

1461
WHAT HOPE FOR PEACE? [editorial] Socialist commentary, July 1967: 3-4.
HX3.S74, 1967

The difficulties of achieving a settlement of the Arab-Israeli conflict reflect a lack of confidence in the ability of the United Nations to cope with local crises. The organization, lacking an army of its own, cannot stop war between two nations determined to fight. It cannot act when the great powers are divided and the smaller powers lined up under their various umbrellas. The United Nations cannot command moral respect as the conscience of the world because it expresses all too clearly the pettiness and self-interest of its members. The picture, however, has a brighter side. The United Nations has provided invaluable conciliation services in many disputes (for example, the Indo-Pakistani war), and can help attain cease-fires and negotiated settlements that avoid the stigma and bitterness of abject surrender. It provides a forum to air grievances, although this occasionally adds fuel to hatreds. In reality peace depends ultimately on two powers, neither of which is fanatically nationalistic or expansionistic, both sharing an interest in preventing escalation of the arms race. While both desperately want to avoid war, both feel that extension of their influence is essential to maintain the balance of power. Two hopes for peace exist: that the United Nations may become an important instrument in promoting world peace; and that powerful nations, hopefully made wiser by the recent experience, will cease meddling in danger areas, will ban the export of sophisticated arms, and will end the "pernicious propaganda war" that aggravates every local issue.

C. INTERNATIONAL PEACE AND SECURITY FORCES

1462
Barrett, Raymond J. INTER-AMERICAN PEACE FORCE. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, May 1967: 85-91. Z6723.U35, v. 47

With the internal security of some of its members threatened by Communist-controlled insurgency, the Organization for American States (OAS) should consider establishing an Inter-American Peace Force. The 1947 Inter-American Treaty of Reciprocal Assistance commits member states to maintain mutual security against any type of aggression. However since evidence of external involvement must be present to justify intervention, action is inhibited by the subtle tactics employed by the Communists in exploiting social and economic discontent. Opponents of an OAS-governed peace force fear that leaving interpretation of the presence of Communist-backed insurgency to the Organization would increase the likelihood of intervention in internal affairs. A peacekeeping force based on national units and requiring permission for deployment either from the host government or a two-thirds majority of the OAS (in the event of confusion in identifying the host government) should reduce this apprehension. Alternatives to a full-scale Inter-American Peace Force include attaching a military committee to the OAS or having representatives from the Inter-American Defense Board advise the OAS on the military aspects of peacekeeping units. In order to respond to situations like the Dominican crisis the OAS will most likely develop some type of peacekeeping facility.

1463
Boyd, Andrew. PEACE-KEEPING IN DANGER. World federalist, Apr./May 1967: 6-8, 17.
JX1901.W825, 1967

Several factors indicate the possibility of future improvement in and extension of U.N. peacekeeping activities: inclusion of peacekeeping provisions in proposed general disarmament plans; lessening suspicion toward international peacekeeping forces, particularly in the African and Asian nations; interpretation of the U.N. Charter to enhance rather than encumber peacekeeping activities; and recognition of the past successes of peacekeeping operations. Experience has proved the workability of international armed forces in spite of language and other barriers, but it has also shown that peacekeeping operations may be more complicated and of longer duration than expected. Critics often complain that U.N. involvement freezes a situation but does not provide a workable solution. However, peacekeeping forces have been used in situations where the alternatives are violent conflict and often major-power involvement. To improve U.N. capabilities in this area, soldiers and civilians with peacekeeping experience should pool their knowledge of practical military matters such as training, equipment, and tactics in order to prepare new troops for their assignment. Unfortunately present political conditions will not permit the creation of an adequate U.N. military planning staff or even a small permanent international force. However, several nations have earmarked military units for peacekeeping duty, definitely a step in the right direction. Outwardly the present U.N. crisis over peacekeeping is financial, but behind the financial dilemma is a political issue. The total cost for the forces is small, but the United States, tired of bearing the entire burden, feels it is a bad policy for the organization to depend totally on a single nation or group of nations. The best way to assure continuance of U.N. peacekeeping activities is for several large (but not major) powers to face their international responsibilities and split the cost of these operations. The cost to each will be small and certainly well worth the investment.

1464
Carsborg, Hans. ON GUARD FOR PEACE. An Cosantoir; Irish defence journal, v. 27, Mar. 1967: 153-155. U1.C8, v. 27

Lists the reasons so many Swedish youths join the United Nations Peacekeeping Force stationed in the Congo, Gaza and Cyprus: adventure, money, and the desire to learn a new language are the leading motivations. The author states that in occupational studies made of participating Swedes those holding jobs in industry and business were predominant.

1465
Martin, Paul. [CANADA'S ROLE IN THE UNITED NATIONS PEACEKEEPING EFFORTS] Les efforts des Nations Unies pour le maintien de la paix. In

Canada. Ministère des Affaires Extérieures. Affaires Extérieures, v. 19, June 1967: 228-241.
JX351.A3, v. 19

A Jacob Blaustein Lecture given by the Secretary of External Affairs, the Honorable Paul Martin, on Apr. 26, 1967.

Summarizes the Canadian government's proposals for financing and reenforcing the United Nations Expeditionary Forces [UNEF]. Martin feels that entrusting the Military Staff Committee with advance planning coordination and advisory functions would strengthen UNEF and that the proposal to increase the number of affirmative votes required for Assembly recommendations on peace and security questions should be carefully studied. The history of the United Nations proves the peacekeeping abilities of UNEF. Yet only a reconciliation among the permanent members of the Security Council will resolve the dispute over how to exercise control over a peacekeeping force.

1466
Melman, Seymour. SMALL WARS: THE PERIL ESCALATES. Nation, v. 204, June 19, 1967: 774-775.
AP2.N2, v. 204

Settling disputes between the United States and the Soviet Union by nuclear confrontation is so unacceptable that both nations have informally agreed to avoid nuclear war. Until recently both considered small, restricted wars valid instruments of political power, but both are now beginning to recognize how easily these small wars can escalate. Today the United States and the Soviet Union recognize that nuclear wars are no-win operations, that proliferation is hazardous, that military altercations between small states can involve them, that the costs of supporting even small wars are immense, and that war breaks down the traditions of moral and legal restraint that limit conflict. War handicaps small nations as well, limiting their economic growth and creating dependence on the great powers for support or assistance. Because of their doubts concerning the speed, impartiality, and reliability of U.N. peacekeeping machinery, small nations tend to place primary reliance on their own armed forces. Joint U.S.-Soviet efforts are needed to come to grips with the arms race. One possible solution is an international peacekeeping force. It should be triggered automatically and have a mobile inspection team that could respond within hours anywhere in the world to determine the nature of the conflict and whether it is international. It must be able to impose a cease-fire quickly and turn the dispute over to an adjudicating body for more permanent settlement. To ensure both reliability and impartiality, its rules and operating procedures must be specified in detail. While the slower diplomatic procedures are producing long-term solutions such a force can prevent small wars and crises from widening beyond control.

1467
OUTLOOK NOW FOR THE UNITED NATIONS: WORLD ORGANIZATION'S CHANGING ROLE. U.S. news & world report, v. 63, July 24, 1967: 28-29.
JK1.U65, v. 63

Only when the Soviet Union and the United States agree can the United Nations exercise its peacekeeping function. The seizure of Goa, Egyptian intervention in Yemen, and new turmoil in Africa have passed all but unnoticed by the world body. On the other hand it played an effective role in supervising cease-fires between India and Pakistan and in Cyprus. In some senses the United Nations has become a prisoner of Communist tactics, as evidenced by its role in both the outbreak and damping of the Arab-Israeli War. Peacekeeping forces were ordered out and permitted back seemingly at the convenience of the Soviet Union and its Arab allies, and American officials have admitted that they are helpless to deal with this tactic. Yet neither Washington nor Moscow can afford to leave the United Nations, for "the U.N. alone can call on smaller powers to provide troops and police to do jobs the U.S. and Russia agree must be done."

1468
Study conference on education for a world without war, Warsaw, 1966. [REPORT] War resistance, v. 2, 3d/4th quarters, 1966: 1-39.
P&GP RR

Some of the papers of the Warsaw Conference, held Aug. 1-7, 1966, under the joint sponsorship of the War Resisters' International and the World Council of Peace. The program, background of the participants, reports of the commissions, and a joint communique are included. Such diverse subjects as the training of teachers, the prerequisites of peace, personality types, and the role of teachers were topics of papers delivered at the conference.

1469
Turner, Frederick C. EXPERIMENT IN INTER-AMERICAN PEACE-KEEPING. Army, v. 17, June 1967: 35-39. illus. U1.A893, v. 17

Examines the organizational problems of command, logistical support, communications, and maintenance that confronted the Inter-American Peace Force [IAPF] in the Dominican crisis of 1965. Despite these obstacles and the language barrier, the IAPF demonstrated to the world that soldiers from different countries could work together. The IAPF, according to the author, has established a valuable precedent for hemispheric cooperation that could play an important role in future Latin American affairs.

D. OTHER PROCESSES, PLANS, PROPOSALS

1470
Alva, Joachim. THE THUNDERER OF THE ANTI-BOMB CAMPAIGN: DR. LINUS PAULING. Forum, Mar. 1967: 21, 27-28, 40.
AP2.F8, 1967

Praises Dr. Linus Pauling for his worldwide efforts against militarism and relates the highlights of Dr. Pauling's Azad Memorial Lectures delivered in New Delhi. In his two lectures--"Science and World Peace" and "The World of the Future"--Dr. Pauling condemned U.S. activity in Vietnam, stated that the increased wealth accompanying scientific advances has brought concomitant inflation due to militarism and does not benefit the poor, emphasized the hardships resulting from overpopulation, advocated a treaty to prevent the sale of sophisticated arms to developing nations, and condemned U.S. bombing of Hiroshima and Nagasaki. The author expressed the hope that the future scientists of India would follow Dr. Pauling's example and stand for peace.

1471
Blishchenko, Igor. KEY ELEMENT OF EUROPEAN SECURITY. New times, no. 25, June 1967: 7-9.
D839.N483, 1967

The key to European security is a European treaty renouncing the threat or use of force. This treaty would embody the basic principle of the U.N. charter which prohibits the threat or use of force. It would be "based not only on general principles applicable to all countries of the world, but also on concrete regional obligations that would conform with the requirements of modern international law." The nonproliferation of nuclear weapons and a clear-cut pledge of nonuse-of-force with no reservations or restrictions would be the main provisions. The effectiveness of the treaty will depend upon the number of nations that sign it. However, the Bonn government refuses to sign such a treaty with East Germany, because it claims "exclusive representation" of the whole of Germany.

1472
Fedorenko, Nikolai T. TIME TO DEFINE AGGRESSION. New times, no. 24, June 14, 1967: 5-6.
D839.N483, 1967

In the interests of world peace, the United Nations Committee on the Definition of Aggression should issue a clear statement soon. Certain Western powers are responsible for the long delay in arriving at a suitable definition. As exemplified by the situation in Vietnam, the imperialists repeatedly interfere with national liberation movements on artificial pretexts such as "self defense" and often attempt to portray the victim as the aggressor. The Soviet Union has urged the United Nations to issue a definition of aggression which would take into account the interests of the emerging countries and which would follow the guidelines established by previous international aggreements and U.N. decisions. U.S. opposition, which is based on the premise that a precise definition of aggression is impossible, does not take into consideration past progress toward a clear definition. A Soviet draft, accepted by the Security Committee of the General Disarmament Conference in 1933, stated that a definition of aggression would be significant in deterring use of unjustified force by the pressure of public opinion alone, even if it weren't backed by provisions for intervention by international bodies.

1473
Galtung, Johan. ON THE EFFECTS OF INTERNATIONAL ECONOMIC SANCTIONS: WITH EXAMPLES FROM THE CASE OF RHODESIA. World politics, v. 19, Apr. 1967: 378-416.
D839.W57, v. 19

The example of Rhodesia offers an opportunity to analyze and explore the "psychological and social mechanisms of economic boycott," the general theory behind economic sanctions, other types of sanctions available within the international system, and the possible countermeasures against economic sanctions. The probable effectiveness of economic sanctions is usually negative. The target society often strives to compensate for the damage, and in the end not only maintains but strengthens the existing structure. Furthermore sanctions against nations are indiscriminate, affecting the just along with the unjust. On the other hand, for reasons of internal economy or trade structure, economic sanctions may force some nations to renounce their goals or at least compromise them. Where a communality of interests exists and rupture of normal relations is perceived as a threat, sanctions may be successful. Even where sanctions are unsuccessful economically they do serve as a clear signal of disapproval of the target nation. However measures such as declarations or resolutions serve a similar purpose at less expense. A number of countermeasures can be invoked by farsighted nations to avoid being vulnerable to economic sanctions, such as diversification of the national economy, defeudalization of international trade, and economic self-sufficiency. A number of measures other than economic sanctions, such as diplomatic maneuvers, reward incentives, sanctions against individuals, individual rewards, or internal sanctions, may well bring more desirable results.

1474
Havens, William W., and others. THE EUROPEAN-AMERICAN NUCLEAR-DATA COMMITTEE. Physics today, v. 20, May 1967: 35-38, 40, 42. illus.
QC1.P658, v. 20

Explains the functions, duties, and accomplishments of the European-American Nuclear-Data Committee [EANDC]--an international organization whose purpose is to gather "nuclear cross sections" and coordinate its findings among the 16 member nations. Its specific duties include: calculating measurements, considering needs for present and future equipment, keeping abreast of available special research materials, carrying out equipment and personnel changes, and recommending conferences and technical symposia. The authors believe that because of the diversity of the U.S. nuclear-energy program the smaller EANDC members may be limited in their exchanges with the United States. In order to be effective the EANDC nations must understand that nuclear-data requirements are changing and that qualitative determinations of nuclear properties are now less important than precise measurements and accuracy of nuclear-energy properties. If the EANDC realizes this it can become a valuable network for carrying out and exchanging data on many of the outstanding nuclear problems of today.

1475
Hoffman, Fredrik. THE FUNCTIONS OF ECONOMIC SANCTIONS: A COMPARATIVE ANALYSIS. Journal of peace research, no. 2, 1967: 140-160.
AS9.J6, 1967

This article studies economic sanctions in their political context, from the point of view of the sanctioning powers. The point of departure here is the question: why does a nation in a given political situation select precisely economic sanctions and not one of the other theoretically possible modes of reaction (stretching from absolute passivity to the declaration of full war)? The article is then based on two case studies: the decision made by the League of Nations to apply sanctions against Italy in 1935, and the decision of the British Government to apply sanctions against Rhodesia in 1965. The League-decision is explained as the outcome of a set of fallacious, legalistic theories about how the international system functions. The decision of the British Government is interpreted as an 'escape' from a political cross-pressure situation. Finally, the contention is formulated that, for political reasons, the probability of successful sanctions is fairly low. (Abstract supplied, modified)

1476
Schwartz, Leonard E. PERSPECTIVE ON PUGWASH. International Affairs (London) v. 43, July 1967: 498-515. JX1.I53, v. 43

Traces the history of the Pugwash Conference on Science and World Affairs and evaluates its performance as a stabilizing force and forum for communication between East and West. Ideas later to be the basis of government policy have originated at the Pugwash Conference, for example, the nuclear test ban treaty. Pugwash has also served as a forum for ideas too sensitive or premature for official discussion, and it has been instrumental in bridging the economic gap between "north and south," for science forms a common denominator that has made it possible for scientists from these countries to discuss problems on equal terms. The author emphasizes that Pugwash has been hampered by a high rate of participant turnover and the shortness of the time scientists are able to devote to the conferences and issues involved.

IV. GENERAL ANALYSES AND COMPREHENSIVE APPROACHES

A. THE HISTORICAL BACKGROUND

1477
Goldschmidt, Bertrand. [ATOMIC RIVALRIES: 1939-1966] Les rivalités atomiques: 1939-1966. [Paris] Fayard [1967] 340 p. (Les grandes études contemporaines) D842. G6

The research that resulted in the discovery of atomic energy was carried out in Paris, Rome, Cambridge, Berlin, and Copenhagen. In 1939 Joliot-Curie's discovery of the chain reaction of nuclear fission disclosed the possibility of producing a new and most devastating weapon. In 1941 President Roosevelt offered to cooperate intimately with Great Britain in nuclear research. The 1943 Quebec agreement assured Anglo-Saxon predominance in nuclear affairs. Neither France nor the Soviet Union was informed of the progress of nuclear research. The exclusion of France led directly to the French decision to develop its own atomic bomb. The Russians, although not officially informed, certainly had gotten some information by their own means. Later the details were explained to them by defecting Western nuclear scientists, who feared that the United States as sole holder of atomic secrets and weapons would try to dominate the world. Fortunately the United States had no such intention. But its Baruch-Lilienthal Plan, which recommended the establishment of a supranational authority to regulate and control the development and use of atomic energy was flatly rejected by the Soviet Union. After the defeat of this plan the arms race began, and the U.S. nuclear monopoly was replaced by Soviet-American predominance. Each of the two powers deviated only once from the monopoly principle. The United States shared its experience with Great Britain, and the Soviet Union helped Communist China to develop its own atomic bomb. Thus, when France finally exploded a bomb, the atomic club had five members, in whose hands rested the destiny of the world. Because the same raw materials are needed for producing both atomic energy for peaceful use and atomic bombs, it will be increasingly difficult to prevent other nations from joining the nuclear club. In order to prevent this spread the United States and its allies have embarked on a policy of nuclear energy and weapons control. Nonproliferation of atomic weapons has become a main objective of U.S. foreign policy, and the Soviets are cooperating in this effort. But since limitation implies world domination by the present nuclear powers, no nonproliferation agreement is likely. New, equally damaging means of destruction will probably appear at the end of this century and multiply the present problems. Only world unity, achieved neither catastrophically nor at the expense of international order, can solve them.

B. GENERAL ANALYSES

1478
Dobiáš, František. ARMAMENT OR SECURITY? Czechoslovak life, v. 22, Apr. 1967: 10. Slav Rm

Renunciation of aggressive war and acceptance of peaceful coexistence are two basic principles of Czechoslovak foreign policy. The country's vulnerable position in the center of Europe, its many fights for freedom and the preservation of territorial integrity, and its experiences during the Second World War have made it apprehensive of any conflict that might involve it in another major war. Lasting peace and security are also essential for practical economic reasons. The defense expenditures imposed on the country are the price it must pay because some bigger countries want to enforce their interests at the expense of the smaller ones. Currently many factors press for security measures. Although the balance of power is stable, and all attempts to rehabilitate war as an instrument of foreign policy are futile, such conflicts as the Vietnam War represent a great danger. Therefore the need for disarmament is urgent, and the proliferation of nuclear weapons must be stopped. Even limited disarmament measures may be helpful if a reduction of nuclear stockpiles can be expected to follow. The present status quo must be preserved, but, on the other hand, commercial, scientific, and cultural relations must be sought, and technological progress must be jointly explored in an atmosphere of peaceful cooperation regardless of differences in political and social systems. Mere control of armaments that requests an abrogation of national sovereignties is hardly acceptable. Progress toward security will be not easy. But due consideration of the present demands of Europe and the world, as well as a realistic view and appropriate action, may lead to earlier and better understanding.

1479
ENQUIRY OF THE POLISH RADIO ON THE QUESTION OF EUROPEAN SECURITY. In International Institute for Peace. Active coexistence, no. 11, Jan./Mar. 1967: 1-24. P&GP RR

Results of an inquiry addressed to citizens and officials of East and West European nations which solicited their views on the problems of European security and Polish proposals for "partial and successive disarmament measures." The prevailing opinion is that world problems "can be solved through peaceful means at the conference table, on the basis of respect for the sovereignty and the right to self-determination of all peoples."

1480
Flechtheim, Ossip K. [POSSIBILITY AND IMPOSSIBILITY OF DISARMAMENT] Von der Möglichkeit und Unmöglichkeit der Abrüstung. WH; Werkhefte, v. 21, Apr. 1967: 108-115. P&GP RR

Realities of nuclear warfare have eliminated the cardinal function of armaments, to safeguard the nation from the enemy. They have not, however, removed a secondary function, which consists of the preservation of order, both international and domestic. Hence domestic policy, particularly economic policy,

has an important influence on armaments. Of no little importance is the attitude of the nation's populace toward military defense, especially its belief that armaments and armed forces will not merely deter enemy attack but also, in case of emergency, secure the nation's survival. With the prevalence of this false belief among nations the arms race must progress. The only solution is development and propagation of nonviolent means of national survival.

1481
Geneste, Marc E. A FRENCH VIEW ON ARMS CONTROL. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, Jan. 1967: 35-41. illus. Z6723.U35, v. 47

Nuclear weapons not only have established a balance of military power in Europe, but also are maintaining an uneasy peace in the world. Because nuclear weapons are so destructive, the threat of total war as an instrument of foreign policy is no longer possible. The reduction or elimination of nuclear weapons would increase the possibility of a holocaust, and even if some form of reduction were agreed upon, enforcement of the agreement would depend upon the willingness of all nations to submit to nuclear inspection and control. Reduction and control would also prevent nonnuclear nations from enjoying the peaceful use of nuclear energy and would allow the great powers to monopolize the nuclear commercial market. Measures designed to prohibit nonnuclear powers from obtaining nuclear weapons and materials would incite people to steal the secrets of the atom, rather than deter them from it. Arms control and disarmament is the domain of the two Great Powers, the United States and Russia. They must seize the initiative to reduce their existing stockpiles--starting with ICBM's, because unlike nuclear explosives they have no peaceful uses--and to formulate an agreement not to produce new weapons that would create a new level of deterrence.

1482
Genevey, Pierre. [THE REALITY OF DISARMAMENT] Actualité du désarmement. Politique étrangère, v. 32, no. 2, 1967: 125-133. JX3.P6, v. 32

The elimination of nuclear weapons or their control under an international authority are chimerical policies, utopian and illusory at best. Peace in the present world is predicated upon mutual deterrence between the great powers. The present nuclear equilibrium can continue only if existing nuclear stockpiles are limited. This can be achieved if nonnuclear countries do not acquire nuclear weapons and if the great powers pursue stable nuclear policies. Construction of an antiballistic missile system [ABM], for instance, would be destabilizing. The limitation of existing nuclear weapons would not alter the nuclear status quo, because the Great Powers would keep their minimal offensive deterrent capability. However, the pursuit of disarmament has been greatly stymied by the withdrawal of France from the Eighteen Nation Disarmament Committee [ENDC] and by its hardline policy of "total disarmament or none at all." It is ironic that France, the great advocate of world peace is against negotiations for disarmament.

1483
Guyot, Raymond. [FOR EUROPEAN SECURITY AND PEACE IN VIETNAM] Pour la sécurité Européenne, pour la paix au Vietnam [editorial] Cahiers du communisme, v. 5, May 1967: 5-9. HX5.C26, v. 5

Discusses the resolutions of the 18th Congress of the French Communist Party: to prevent West German acquisition of nuclear weapons; to obtain recognition of East Germany and the German boundaries resulting from World War II, European security, and the dissolution of military blocs. The author believes that the U.S. control over NATO is the major obstacle to European stability, cooperation, and security. Guyot also stresses the importance of the Vietnamese War and the Communist Party's central task of countering American aggression in that part of the world.

1484
Lall, Betty (Goetz) THE ABM DECISION. Commonweal, v. 86, Apr. 21, 1967: 144-147. AP2.C6897, v. 86

Deployment of an antiballistic missile [ABM] system would spoil the chances for a successful nuclear nonproliferation treaty or any treaty imposing limitations in testing and production. The disadvantages of the ABM, aside from its exorbitant price and the probability that it would accelerate the arms race, include the possibility that nonnuclear countries would desire an ABM system for their own defense. Since deployment of an ABM system would foster mutual distrust and encourage proliferation, a negotiated agreement between the two Great Powers to limit both defensive and offensive missiles would be a reasonable step. Proposed agreements to limit defense armaments exclusively are futile. The Russian military hierarchy would never agree to such proposals because its strategy is traditionally defensive. Also this type of agreement would only maintain the status quo: American numerical missile superiority. On the other hand, politicians in the United States fear that an agreement to limit offensive weapons would equalize the present 4-1 U.S. advantage. Yet, it has become apparent that controls on deployment and production of both types of weapons are the only solution. The crucial question is the precise nature of an agreement. The omnipresent obstacle to nuclear limitation agreements--inspection, which the United States has always considered a sine qua non--has been pushed into the background by recent technological advances, including reconnaissance satellites. Indeed today the main obstacle to effective arms control is the Vietnamese War. Until that is settled there is no real hope that the perplexing ABM problem can be solved.

1485
Lambert, Robert W. GLOSSARY OF ARMS CONTROL AND DISARMAMENT TERMS. Washington, U.S. Arms Control and Disarmament Agency, 1967. 66 p. (U.S. Arms Control and Disarmament Agency. Research report 67-2) P&GP RR
Bibliography: p. 65-66.

Explains terms relevant to arms control and disarmament. The collection includes cross references and, whenever necessary, gives the historical background of the meaning of each term.

1486
Vernant, Jacques. [CONDITIONS OF DISARMAMENT] Les conditions d'un désarmement. Revue de défense nationale, v. 23, May 1967: 873-877. D410.R45, v. 23

Enumerates theories and conclusions on disarmament. As summarized by Vernant, a reduction in

arms by the great powers would not modify the mutual-stalemate situation; the existence of nuclear arms with their limitless destructive capability creates a "kind of peace" among the states that possess them; the nuclear test ban treaty does not constitute disarmament, because it forbids only underground testing; without China's participation in disarmament negotiations there can be no real disarmament; and restrictions on the sale of conventional arms could relieve certain tension areas by making these weapons hard to acquire.

1487
Wolk, Herman S. ARE NUCLEAR WEAPONS OBSOLETE? In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, Jan. 1967: 67-71. illus. Z6723.U35, v. 47

Claims that nuclear weapons are largely responsible for the relative stability that exists in the world today. They create a strategic equilibrium that has brought certain tacit restraints into bipolar relations. Past and present limited wars have not expanded into major conflagrations due to nuclear weapons. It would be illogical and emotional to banish them. Disarmament would hinder rather than maintain the stability created by these weapons.

C. GENERAL AND COMPLETE DISARMAMENT

V. SPECIFIC PROBLEMS AND LIMITED MEASURES

A. NEGOTIATION

1488
[EVOLUTION OF CANADIAN POLICY IN 1966] Évolution de la politique du Canada en 1966. Chronique de politique étrangère, v. 20, May 1967: 291-305.
D839.C82, v. 20

Surveys the evolution of Canadian foreign policy in the United Nations, NATO, and the Commonwealth, and Canada's relations with the United States, the Soviet Union, Vietnam, and France. Special emphasis is placed on disarmament and nuclear proliferation. The Canadian Government believes that the International Atomic Energy Agency should implement specific guarantees for the control and utilization of peaceful nuclear energy, that agreement should be reached on the prevention of underground nuclear explosions, and that a nonproliferation treaty should be signed as soon as accord is reached between the nuclear and nonnuclear powers. Before a nonproliferation treaty can be implemented the nuclear powers must offer security guarantees to nonnuclear powers and to countries that have the ability to produce nuclear weapons but have chosen not to (e.g., India and Japan). The Canadian Government also supports nations involved in the formation of denuclearized zones.

1489
Galtung, Johan. TWO APPROACHES TO DISARMAMENT: THE LEGALIST AND THE STRUCTURALIST. Journal of peace research, no. 2, 1967: 161-195.
AS9.J6, 1967

Disarmament thinking and particularly disarmament negotiations are governed by a legalist frame of reference patterned after domestic law, based on the ideas of establishment of a set of norms (a treaty), detection machinery to discover deviance, adjudication machinery concerned with verification, conviction, and sentences, a system of sanctions, and a validation system (Supreme Courts in domestic law). To the extent this kind of thinking prevails, we are unlikely ever to get disarmament, since distrustful legalists will always find loopholes in the control mechanisms. Besides, it is also probable that many control mechanisms are counter-productive and produce rather than eliminate cheating, and sanctions are almost certainly counter-productive when they are based on the principle of collective guilt in the nation breaking the treaty. Equally dangerous is the tendency that legalistic negotiators will disregard factors that may stimulate disarmament, because they cannot be accommodated within their paradigm. Such factors are the idea of morality, positive exchange and cooperation between antagonists, positive sanctions for nations that keep the treaty as well as punishment for those who do not, efforts to punish individuals rather than nations if somebody should be punished, inspection by the people of their own government, unilateral steps, tacit agreements, and a dilution of the legalistically dominated environment for disarmament negotiations with people of all other kinds of background. Legal language and legal paradigms provide the parties with a false sense of being able to communicate, when in reality they understand each other too well, so well that they disregard major possibilities and concentrate on major difficulties. Some models for cooperation between legalists and structuralists are outlined. (Abstract supplied, modified)

1490
Griffiths, Franklyn. THE POLITICAL SIDE OF "DISARMAMENT." International journal, v. 22, spring 1967: 293-305. D839.I5, v. 22

The idea of "negotiated" disarmament originated in the 19th century when a "legalistic and formal conception of the state" dominated the Western view of politics. The sovereign state was thought to be the sole authoritative actor in external affairs, and the locus of its decisions in interstate relations thought to rest with the negotiators. Today's international analysts have retained that legal-institutional view of the state as sole actor. History shows that states are internally divided on arms control questions and that interactions among groups in various national settings can substantially affect international negotiations. Nonetheless disarmament proponents, operating on the basis that rational men can legislate desired change and then adjust to the new order, continue to see as their problem the search for ways to bridge negotiating differences. The underlying motivations of the negotiators and the possibility that agreement might not ultimately be reached is not considered. Diplomats, Scientists, and Politicians: The United States and the Nuclear Test Ban Treaty, by Harold K. Jacobson and Erik Stein (University of Michigan Press, 1966), illustrates many of the shortcomings of traditional analysis of arms control. The authors accept a government's declared policy as indicative of its intentions and willingness to act, a view which overlooks the subsurface conflicts and trends that bear on policy and on the will to implement a formal decision. They view policy-making as an intellectual and technical process and fail to investigate the role of overt negotiating conduct in the policy process. Viewing the nation-state as an autonomous actor in international relations, they miss the relevance to a nation's own conduct of an adversary's internal and external actions. A theory of international relations relevant to arms control should focus on the "process of interdependent decision," looking for parallels of behavior among internally differentiated adversaries. This theory, known as reciprocal interdiction, describes the process by which interactions among nations alter the balance of competing groups in each nation's political system in response to signals that indicate change in actions and posture of the others. Groups within separate political systems that combine informally through seemingly parallel spontaneous action partly account for the rise and fall of tensions between nations. The stable transnational linkages that seem to be developing, at least among advanced nations, may have significance not only for arms control and disarmament but for the whole nation-state system.

1491
Jack, Homer A. DISARMAMENT AT THE 21ST U.N. GENERAL ASSEMBLY. Disarmament, no. 13, Mar. 1967: 13-19. JX1981.P7D5, 1967

Summarizes U.N. General Assembly discussions and activities in areas related to disarmament: the treaty on outer space, nonproliferation, a comprehensive test ban, the Geneva Protocol condemning the use of chemical and biological weapons, U Thant's proposal for a study on the probable effects of nuclear war, elimination of foreign military bases, the convention to prohibit the use of nuclear weapons, the Report of the 18-Nation Disarmament Conference to the General Assembly, and various other matters. "As the diplomats talked, the stockpiles of arms rose, even faster than the mounting verbatim disarmament records and unimplemented disarmament resolutions."

B. REDUCTION OF THE RISK OF WAR

1. Escalation

1492
SOVIET ESCALATION. Minority of one, v. 9, July/Aug. 1967: 5. AP2.M55985, v. 9

Soviet support of Communist forces in Vietnam is becoming more discernable. Whether this support is of strategic value or whether it is designed to "camouflage essential noninterference in Vietnam" remains to be seen. Naval "accidents" in the Tonkin Gulf and official Soviet complaints regarding loss of Soviet lives in North Vietnam are indicative of incipient escalation. However, continued U.S. escalation as evidenced by increasing air strikes over North Vietnam and reconnaissance flights over China weakens the credibility of Soviet escalation as a deterrent factor. The United States' intentions in Asia are clear; all of Asia is threatened by nuclear war. A viable and effective Soviet escalation in Vietnam is the only factor that could dissuade the United States from carrying out its intentions in Southeast Asia.

2. Conventional Arms Transfers

1493
Dobbs, Theodore B. MUNITIONS CONTROL: U.S. FOREIGN POLICY INTO ACTION. In U.S. Department of State. Newsletter, no. 75, July 1967: 10-11. JX1.U542, 1967

Licensing the export of arms and controlling the arms traffic are integral parts of the foreign relations of the United States. In contrast to licensing controls for commercial commodities, the primary issues in this area are political and often involve military security considerations. Since arms export operations must be sensitive and responsive to foreign policy requirements, it is most desirable that responsibility for them remain with the Office of Munitions Control in the Department of State. All U.S. firms engaged in manufacturing, exporting, or importing items on the "Munitions List" must register with the Department and keep a record of all export or import transactions for specified periods. This licensing system is an important instrument of supervision and regulation. Most proposed shipments are routine in character and are quickly approved by licensing officers. However, in tense and unstable areas of the world, political guidance must be sought on individual cases. The Munitions Office frequently seeks the views of the Defense Department and other agencies and of other offices within the State Department concerning proposed transactions. In recent years the Munitions Office has devoted much time to restaffing and reorganizing in an effort to be responsive to industry and yet protect the security interests of the U.S. Government.

1494
Estep, Raymond. UNITED STATES MILITARY AID TO LATIN AMERICA. [Maxwell Air Force Base, Ala.] Documentary Research Division, Aerospace Studies Institute, Air University, 1966. 272 p. (Air University documentary research study AU-200-65-ASI) UA12.E8

Bibliography: p. 259-272.
Bibliographical footnotes.

Outlines the various phases of U.S. military aid programs in Latin America since World War II, including lend-lease, military assistance, military missions and training, and civic action programs. Appendix A reviews the Congressional arguments for and against various postwar programs. Appendix B contains a country-by-country description of U.S. actions to secure Latin American cooperation. The study is documented throughout and contains a sizable bibliography.

1495
Gutteridge, William F. THE POLITICAL ROLE OF AFRICAN ARMED FORCES: THE IMPACT OF FOREIGN MILITARY ASSISTANCE. African affairs, v. 66, Apr. 1967: 93-103. DT1.R62, v. 66

It is not true that military coups in developing countries are entirely the result of factors within the armed forces responsible for them. Particularly in African countries local factors, such as strong family connections and tribal distribution in the armed forces, affect political actions. Although nations with embryonic military institutions may look to the various military systems of the major powers for a model for their organizations, the major powers only indirectly affect the political role of the military in the underdeveloped countries they aid. The variations in the political role of the military in different countries formerly under the same colonial ruler illustrate the difficulties of transferring a military tradition to a foreign culture. By risking confusion of military traditions and accepting aid from multiple sources in order to maintain their neutrality, African states further reduce the lasting influence of foreign aid. Since arms requirements in African countries are tailored principally to internal security purposes and Africans resent outside control, rival aid donors are generally not motivated by strategic interests; thus a serious arms race on the African Continent is not likely. The small size of the military forces together with political circumstances works against the survival of any military government in Africa even though it may have a technically well-equipped and cohesive administrative organization. Generally outbreaks of violence against local authorities are a reaction to specific grievances, not a trend toward military dominance. While foreign aid may equip the military with capability for political action, the local cultural environment is the factor which determines the political role of the armed forces of emerging countries.

1496
Hickmott, J. R. WE MUST HAVE CONVENTIONAL BRITISH WEAPONS. Contemporary review, v. 210, Apr. 1967: 171-172. AP4.C7, v. 210

The British Government's decision to purchase fighter aircraft from France rather than produce them at home shows a complete lack of understanding of basic defense requirements. It assumes that conflict among the Western allies is unlikely, and that equipment will be delivered irrespective of political differences. British dependence on French aircraft could very well encourage an aggressor "to embark on a European adventure." It is both dangerous and incorrect to think nuclear war is inevitable and conventional weapons useless. An aggressor does not seek to dominate destroyed and contaminated areas; thus nuclear weapons exist basically for deterrence only, and conventional armaments will be employed in conflict. Unless Britain is willing to respond to a conventional attack with nuclear arms it must develop strong conventional forces. It cannot rely on other nations to supply the necessary arms, particularly in the early stages of a conflict when they might be debating policy, looking to the United Nations to solve the matter, or physically unable to send aid.

1497
McCarthy, Eugene J. THE U.S. SUPPLIER OF WEAPONS TO THE WORLD. Saturday review, v. 49, July 9, 1966: 13-15. Z1219.S25, v. 49

In the 1930's merchants who sold weapons to foreign nations were reviled as "Merchants of Death," but today the U.S. Government is encouraging arms sales. U.S. military assistance in the past 15 years totals $35 billion. Concern for nuclear proliferation should not distract attention from the even more serious threat of conventional arms proliferation and distribution. The principal purpose of U.S. military aid, whether in grants or sales, is to avert the spread of communism, but other considerations are also involved. Newly independent nations are anxious to acquire arms for the prestige they bring. Arms suppliers find they can increase their influence on the recipient country since it depends on them for training missions and spare parts. Both the United States and the Soviet Union tend to concentrate their military assistance in developing areas to nations that border the other's sphere of influence. Increasing arms sales are also a product of the U.S. desire to overcome its balance of payments deficit. Secretary of Defense McNamara, who recently praised the record of the Pentagon arms salesmen, rationalizes that if the United States did not supply arms to interested nations, others would provide weapons at even higher prices. On the other hand, the United States has proposed to the 18-Nation Disarmament Conference that nations explore ways to limit competition among themselves for costly weapons through regional arrangements. It appears that "the left hand of the government is trying to control what the right hand is busily promoting." The United States must attempt to disengage itself from the arms competition and use its influence to persuade other major suppliers to accept some kind of conventional arms moratorium.

1498
Martin, Laurence. THE MILITARY BALANCE: WHAT CAN THE GREAT POWERS DO? Spectator, v. 218, June 9, 1967: 672. AP4.S7, v. 218

Virtually all of the powerful weapons that enabled the Middle Eastern nations to prepare for war were supplied by four large powers: Russia, the United States, France, and Britain. Between them they poured more than 1,300 jet aircraft, 2,000 tanks, 24 warships and many other vessels, and several hundred guided missiles into the area. Those who advocated armed intervention by the Western powers during the crisis underestimated the obstacles that the dissemination of such sophisticated weaponry would pose and the capacity of regional powers for armed resistance. Gunboat diplomacy was once popular, not only because of an absence of moral constraints but also because the gunboats won. Today medium-sized powers must be approached with caution, in spite of the obvious edge the great powers enjoy. Modern weapons, able to inflict losses on an opponent even in inefficient hands, serve as equalizers between great and small nations. The recent outbreak in the Middle East proves the long-standing assumption among those nations that in the event of conflict they would be dependent entirely on their own efforts. Conditions for a renewed arms race will persist in the Middle East until some great power provides sufficient guarantees that it will protect the country that doesn't join the arms race. The chances of limiting the arms race without guarantees are extremely poor. Some may argue that once regional powers have nuclear weapons they will deter each other, but this belief requires considerable confidence "in the triumph of theory over human nature." The great powers must recognize that their desire to control the world's military and nuclear future requires the "painful" construction of a world security system. The current effort to build such a security system in the Middle East will test their commitment to that aim.

1499
U. S. Congress. Senate. Committee on Foreign Relations. ARMS SALES AND FOREIGN POLICY: STAFF STUDY. Washington, U.S. Govt. Print. Off., 1967. 13 p. HD9743.U6A54

At head of title: 90th Congress, 1st session. Committee print.

Analyzes the American military assistance and arms sales programs in terms of market, financing, and policy implications. The study concludes that the Nation has drifted into a policy of "preemptive selling rather than the more difficult alternative of arms denial," and that the present machinery for policy control and legislative oversight of the arms programs needs adjustment.

1500
Wetmore, Warren C. EGYPT SEEKS NEW SOVIET MISSILES. Aviation week & space technology, v. 87, July 10, 1967: 26. TL501.A8, v. 87

The Arab nations refuse to accept defeat. They are receiving shipments of Russian military equipment and continue to violate cease fire agreements by infiltrating border areas and staging guerrilla warfare. The leaders of Egypt and Syria believe that maintaining high levels of tension in the Middle East will insure the stability of their own governments and boost the morale of their people. Israel believes that it will take at least a year before Egypt can reach a state of military preparedness, Russian arms shipments notwithstanding. In fact the Sinai peninsula has become an effective buffer zone for the Israelis and has reduced the capability of Russian surface-to-surface missiles.

3. Nuclear Proliferation

1501
Ačić, B. A STEP TOWARD DISARMAMENT. Review of international affairs, v. 18, Apr. 20, 1967: 6-7. JX1.C6, v. 18

The U. N. General Assembly recently adopted a Soviet proposal to facilitate the conclusion of the nuclear nonproliferation treaty. Although the two superpowers seem to be ready to agree upon a draft treaty very soon, objections from NATO are hampering progress. These objections mainly concern the security of nonnuclear states, restrictions on the use of nuclear explosions for peaceful use, and the implementation of the treaty. In exchange for renouncing production of nuclear weapons, the nonnuclear countries request that clearly defined guarantees against attack be included in the treaty itself or in another equivalent act. They also request gradual denuclearization of the nuclear powers. They insist that they cannot depend solely on the good will of the nuclear powers for technical aid in developing nuclear energy for peaceful use without falling back economically. They do not accept the obvious fact that this problem could be solved by their acceptance of regulated control by the International Atomic Energy Commission, which is the only duly authorized institution for controlling the implementation of the nuclear nonproliferation treaty. The durability and effectiveness of the treaty depend mainly on nonviolation by the nuclear powers, but also demand the loyal cooperation of the nonnuclear countries. If international security is to be achieved, it must be based on improved international relations, peaceful solution of international disputes, and a continual process of disarmament--in which the nuclear nonproliferation treaty is an important step.

1502
Brandt, Willy. [GERMANY AND THE NUCLEAR NONPROLIFERATION TREATY] Deutschland und der Atomsperrvertrag. Aussenpolitik, v. 18, May 1967: 257-267. D839. A885, v. 18

Explains the German Federal Republic's position on the proposed nuclear nonproliferation treaty. Brandt points out West Germany's concern that the treaty not curb the peaceful utilization of atomic energy by the nonnuclear nations, that it include the signatories' specific commitment to general disarmament, and guarantee the security of nonnuclear nations, and that it not adversely affect regional unification efforts as in Europe. The West German foreign minister emphasizes that Germany's industrial future depends on the peaceful utilization of nuclear energy and that the German Federal Republic has no ulterior motive in its requests that treaty provisions be equitable.

1503
Buchan, Alastair. THE POLITICS OF NONPROLIFERATION. Listener, v. 77, May 11, 1967: 607-609. illus. AP4. L4165, v. 77

The nuclear nonproliferation treaty is only one aspect of a nonproliferation strategy--an international system that redefines the responsibility of the stronger states, strengthens the U. N., and accommodates changes in the relative power of states. Ratification of the treaty though is menaced by a number of problems: inspection, adequate security for the nonnuclear powers, and provision for a "balance of obligations." Among these the most thorny problem is how the undertakings of all parties concerned are to be safeguarded and verified. A proposed plan in which Euratom would supersede the International Atomic Energy Agency [IAEA] as the inspection agent for all the nonnuclear signatories was rejected by the Russians, and the Europeans are opposed to the Vienna system (inspection by the IAEA), fearing "industrial espionage." The nonnuclear powers have also intimated that the price for enforcement of impending nuclear arms control and reduction measures--a freeze on delivery systems, an underground test ban, etc. --among the Great Powers, may be either their signatures to a nonproliferation treaty or maintenance of it once it is signed. Considering these obstacles it is quite improbable that a treaty will be signed this year.

1504
Burns, E. L. M. CANADA ON NONPROLIFERATION. In Canada. Department of External Affairs. External affairs, v. 19, Apr. 1967: 139-141. JX351. A3, v. 19

A statement delivered before the 18-Nation Committee on Disarmament, Feb. 28, 1967, by the permanent representative of Canada.

States Canada's views on the nuclear nonproliferation treaty, especially problems involving proliferation, technological "spin off," inspection, and the economic and scientific benefits of the treaty.

1505
Chakravarty, B. N. INDIA AND NUCLEAR NONPROLIFERATION TREATY. Indian Marxist, v. 3, May 1967: 33-34. HX3. N2515, v. 3

The proposed nonproliferation treaty fails to take into account the legitimate objections of the nonnuclear nations. It places few restraints on the nuclear states, even permitting them to continue their weapons programs through underground nuclear testing. Nevertheless many in India favor signing such an uneven treaty, because they feel it may reduce the danger of war. While proliferation does increase the chance of war through accident or miscalculation, new entrants to the nuclear field would undoubtedly be as responsible and cautious as the existing nuclear powers are. On the other hand, nonproliferation is more important to the nuclear "haves" than to the "have-nots," who must still face the dangers of conventional war. Furthermore, a nonproliferation agreement can hinder chances for disarmament, for once the nuclear states have eliminated this threat they will have little incentive to relinquish their advantage. The treaty fails to provide for nuclear-arms reduction or for international inspection of the allegedly peaceful activities of the nuclear powers. The nonnuclear nations must not only renounce their nuclear weapons, but must submit their peaceful nuclear activities to inspection. The United States even wants to ban peaceful nuclear explosions by nonnuclear states, suggesting instead that they pay a nuclear power for this service. Furthermore, the Chinese refusal to sign the treaty enables them to assist other nations in manufacturing or acquiring nuclear weapons, which they have indicated their willingness to do. Although India as a neutral nation has no nuclear protector, it would nonetheless have signed the proposed treaty were it not for the Chinese acquisition of nuclear weapons.

1506
Chalfont, Arthur Gwynne Jones, baron. ON NONPROLIFERATION. International science and technology, no. 61, Jan. 1967: 82-84, 86, 88, 90. Q1. 1587, 1967

An interview with the British Disarmament Minister during his stay in New York as head of the British U. N. team negotiating a nonproliferation treaty. Chalfont speaks of the experiences that led him, a professional soldier, to become a "professional disarmer." The greatest danger of war, he feels, stems from the

depersonalization of modern weapons, which allow men to kill from positions remote from the battlefield. A nonproliferation treaty could make an important contribution to reducing the likelihood of war. While such a treaty is unlikely to affect the existing weapons levels of Communist China or the superpowers, it could provide common ground between the Soviet Union and the United States, bring China to the international negotiating table, and ensure that peaceful nuclear facilities are not clandestinely diverted toward weapons production.

1507
A CHINESE STATEMENT ON NUCLEAR PROLIFERATION. Bulletin of the atomic scientists, v. 23, May 1967: 53-54. TK9145. A84, v. 23

Article "reprinted from the Renmin Ribao, Nov. 15, 1966. This translation appeared in the Peking Review . . . November 18, 1966."

States the Chinese position on nuclear proliferation and the nonproliferation treaty proposed by the United States and the Soviet Union, and Chinese arguments for total prohibition and destruction of nuclear weapons. The Chinese government believes that both the Soviet Union and the United States by proposing a nonproliferation treaty are depriving nonnuclear nations of their inherent rights, violating their sovereignty, and subjecting them to nuclear blackmail. The author finds the Soviet Union's collaboration with the United States on the Vietnam question and the nonproliferation treaty deplorable.

1508
EUROPE AND THE BOMB [editorial] Spectator, v. 218, May 12, 1967: 545. AP4. S7, v. 218

Before the nonproliferation negotiations go any further, Britain should declare its nuclear capability "in solemn trust for the European nuclear force of the future." The interests of the European nations singly, and peace in Europe generally, require that as many European states as possible combine into a new great power bloc, possessing nuclear status and allied to, but independent of, the United States. For Europe to remain militarily weak and dependent on the United States would lead only to disaster. British and French nuclear forces should be reserved for the defense of Europe when it becomes genuinely united. Until then, other Common Market nations should consult with Britain and France on targeting and other nuclear matters. While retaining control over its own weapons, each nation should cooperate in further nuclear development. Prime Minister Wilson has claimed such measures would damage the chances of achieving a nonproliferation agreement and impede progress toward an East-West détente. However, the merging of the two national forces into one is the reverse of proliferation, and the chances of European settlement would be enhanced by its freedom to act independently of the United States. The real casualty of Anglo-French nuclear collaboration would be Britain's special relationship with the United States. To expect the United States to continue to pass information to Britain which would be shared with others is unrealistic. Militarily this would not be a large sacrifice for Britain. Politically it would prove a great advantage in Britain's attempts to enter the European community.

1509
AN EXPERT SIZE-UP OF RED CHINA AS A NUCLEAR POWER. U.S. news & world report, v. 63, July 3, 1967: 38. JKI. U65, v. 63

Conversation with Dr. Chu-yuan Cheng of the University of Michigan's Center for Chinese Studies regarding the significance of Communist China as a nuclear power. According to Dr. Cheng, Communist Chinese achievements in refining the hydrogen bomb and improving delivery systems will cause concern to Russia and the United States over the long run and pose a more immediate problem to Japan and India. He believes Peking may lend nuclear weapons to the Middle East to acquire support in its quest for Third World leadership.

1510
Feld, Bernard T. A PLEDGE: NO FIRST USE. Bulletin of the atomic scientists, v. 23, May 1967: 46-48. TK9145. A84, v. 23

A pledge by the "military nuclear powers" to forgo the use of atomic weapons against the nonnuclear countries would indicate their willingness to adopt meaningful restrictions on their nuclear capabilities and would represent a significant step in the resolution of complex nonproliferation problems. However, a pledge without any means of enforcement or guarantee of compliance is regarded as an unstable solution to nonproliferation. It would change the nuclear status quo by providing false reassurance and thus encouraging provocative and adventuristic acts that could lead to total war. Nevertheless a limited pledge is highly desirable. It would reinforce the détente between the NATO and Warsaw Pact nations and reduce reliance upon tactical nuclear weapons in Europe. A pledge would erase the threat of nuclear blackmail and minimize the influence of nuclear weapons on foreign policy and international conflicts. It would have to be accepted by all five nuclear powers without a treaty or formal negotiations. China, which presents the greatest obstacle to a pledge, has announced its intent never to use nuclear weapons for aggression--this intent could be taken as an assumption of acquiescence.

1511
Foster, William C. ARMS CONTROL--AN AMERICAN VIEWPOINT. Ecumenical review, v. 19, Apr. 1967: 143-145. BX1. E3, v. 19

Nuclear proliferation is a dual problem: the horizontal danger that additional nations may acquire nuclear weapons, and the vertical threat of an upward-spiraling arms race among the nuclear powers. Solution of the problem is a good deal simpler than is generally realized, if nations move step by step in a logical order. The first step was the limited nuclear test ban treaty signed in 1963; the next is the proposed nonproliferation treaty. After this, additional measures will be necessary, including a comprehensive test ban, a verified cutoff of the manufacture of fissionable materials for weapons purposes, and a verified freeze on strategic nuclear delivery vehicles. These steps can cope with both the horizontal and vertical aspects of proliferation. The main barrier to acceptance of these measures is the Soviet refusal to permit inspection. Hopefully this Russian "phobia about foreign spies" will give way in time. Man cannot ban the bomb by sweeping decree; he must build enough confidence for nations to gradually disarm through balanced and phased steps.

1512
Fuchs, Klaus, and Max Steenbeck. WHAT ABOUT NON-PROLIFERATION? Democratic German report, v. 16, Apr. 7, 1967: 50 DD261. D3, v. 16

Abridgment of an article from Die Weltbuhne. AP30. W33

Lists the German Federal Republic's objections to the proposed nonproliferation treaty. The authors argue against these objections and state that the real reason West Germany does not support the treaty lies in its ambition to obtain nuclear weapons or manufacture them in another country.

1513
Huemer, Oskar. [STRATEGY FOR THE PREVENTION OF WAR] Die Strategie der Kriegsverhinderung. Die Zukunft, no. 6, Mar. 1967: 18-19.
H5. Z85, 1967

Opposition by the nonnuclear nations to the draft treaty on nuclear nonproliferation is quite reasonable, the proposed treaty's high objectives nonwithstanding. For one thing the treaty suggests a permanent moral discrimination between responsible and allegedly irresponsible nations--a totally unacceptable notion. But more importantly it would make the nonnuclear nations an easy target of nuclear coercion, thus disrobing them permanently of effective means of self-protection. It would increase chances of a "Cold Nuclear War" being staged against the underprivileged nations by the privileged (nuclear) ones. Important for deterrence against nuclear attack is a disproportionate efficacy between a nuclear first strike and the second strike, so that damage caused by nuclear retaliation will far exceed that suffered from the initial nuclear attack. The main preoccupation of nuclear strategy is to preserve that disproportion in order to prevent nuclear war from ever taking place. No modern nation can afford to ignore that consideration in its defense strategy, conventional or nuclear. Industrial production of hydrogen bombs will eventually become easily accessible "even to economically weaker nations," because sooner or later the cheap, readily available laser will replace uranium as a means for detonating fusion bombs. Fears that nuclear proliferation will upset the existing balance of power can be dismissed with the argument that spreading atomic responsibility among "various decision centers of small nuclear potential" would increase stability on the level of second-rate powers. A most serious shortcoming of the proposed treaty is its failure to provide for limitation of armaments within the nuclear club itself.

1514
AN IMPORTANT STAGE IN THE GENEVA TALKS, by Commentator [pseud.] International affairs (Moscow) May 1967: 35-38. D839. I465, 1967

Examines the primary obstacles to final settlement and ratification of the proposed nuclear nonproliferation treaty. The author explains that the Soviet Union is opposed to any infringement of nonnuclear countries' rights in the peaceful uses of atomic energy. However, it regards atomic explosions for peaceful purposes as a separate issue that should be settled by a different international agreement. The question of nuclear guarantees to those countries who have pledged to abstain from using nuclear weapons is clarified by proposals of nuclear-free zones--as in Latin America. Treaty opponents who argue that it threatens their security have no basis for such pleas. The only effective defense against nuclear attack would be complete and total disarmament. Inspection safeguards would best be implemented under an international agency such as the International Atomic Energy Agency. Proposals of self-investigation under Euratom [European Atomic Energy Community] only serve to undermine conclusion of the treaty.

1515
Inglis, David R. MISSILE DEFENSE, NUCLEAR SPREAD, AND VIETNAM. Bulletin of the atomic scientists, v. 23, May 1967: 49-52.
TK9145. A84, v. 23

During the past 20 years the problem of limiting nuclear weapons has been aggravated by the nuclear hawks, who consistently and successfully advocate a foreign policy of nuclear superiority and threat. Today there are three interrelated problems that must be resolved to deter the hawks from leading the nation into a nuclear holocaust. The construction of an antiballistic missile [ABM] system which, they advocate, would interfere with the possibilities of constructive diplomacy by placing full faith in armament deployment as the source of national security, and would engender an arms race involving further Soviet buildups. The present Soviet ABM system has no effect on our relative strategic posture. America's numerical missile superiority would only seem to be diminished in the eyes of Soviet strategists, if they can be led to overvalue their partially effective defense arrangements. Secondly, nuclear nonproliferation requires specific guarantees to nonnuclear nations. These guarantees should include defense commitments and restraints on the use of nuclear weapons. However, ABM deployment in those countries brought under the "nuclear umbrella" would make diplomacy inflexible and harden Communist policy toward nonproliferation. Thirdly, the hawks have successfully escalated the war in Vietnam. Their inability to understand Asia's fear of foreign domination and their lack of historical insight into the problems of containment in Asia--vastly different from those confronting the allies after World War II--have not only caused an unstable military and political situation in Asia, but have kept the United Nations from effectively supporting the terms of the Geneva Convention of 1954.

1516
JSP-GOVERNMENT DEBATE ON THE QUESTION OF NUCLEAR NON-PROLIFERATION IN THE DIET. Japan Socialist review, no. 134, June 15, 1967: 37-48.
HX9. J3, 1967

Excerpts from the May 17, 1967, debate between Shichiro Hozumi, Socialist member of the Japanese House of Representatives, and Takeo Miki, Japanese Foreign Minister, on Japan's policy toward the proposed nuclear nonproliferation treaty. Miki states that the Japanese Government supports the aims of the proposed treaty, but that it cannot endorse it until certain provisions are included. Among the primary requirements are provisions to permit peaceful atomic programs by the nonnuclear powers and to obligate the nuclear powers to move toward nuclear disarmament. Miki unqualifiedly asserts that regardless of the outcome of international debate on the treaty, "Japan has no intention of having nuclear weapons nor developing them." He also expresses his Government's hopes for a ban on underground nuclear explosions.

1517
Johnson, Frank J. THE GERMAN QUESTION AND THE NUCLEAR NONPROLIFERATION TREATY. In American Security Council. Washington report, May 8, 1967: 1-4. P&GP RR

President Johnson and his advisers are urging acceptance of a nuclear nonproliferation treaty in which nonnuclear nations forswear their right to manufacture nuclear weapons and rely for their security on

276-835 O-67—5

the willingness of the nuclear powers to defend them. The Soviet Union, while willing to sign, is not showing any great eagerness to do so, but is instead watching the U.S. try to override the wishes of its allies in order to obtain approval of the treaty. The Soviets see the treaty as a means of undermining NATO solidarity and weakening the credibility of the American nuclear deterrent. In Europe particularly, nonnuclear nations have shown no inclination to accept what they term "perpetual discrimination" of a sort that would give the United States a permanent technological advantage over them in the peaceful use of nuclear energy. They object to the treaty's insistence on International Atomic Energy Agency [IAEA] rather than European Atomic Energy Community [Euratom] inspection, fearing it could give the Soviets access to secret technological data. West Germans fear the treaty presages a Soviet-American deal at their expense. They find that reunification is possible for them only through recognition of East Germany, withdrawal from NATO, disarmament, and a strong Communist voice in a united Germany. Their friendly overtures have been rejected, and yet they have been asked to sign a treaty which will leave them entirely dependent on the U.S. deterrent. If they refuse to sign the nonproliferation treaty, they will be accused of jeopardizing man's chance for world peace. West Germany is quite capable of making its own deal with the East if it regards this as the lesser evil, but the harshness of the East German-Soviet terms make this unlikely at present. The ability of a nation to defend itself against nuclear attack without depending on another country should do more to reduce the danger of war by miscalculation than the proposed nonproliferation treaty. The United States must carefully consider whether the dubious benefits of the treaty are worth the political damage it may do to the already battered NATO alliance.

1518
Kahn, Herman, and Carl Dibble. CRITERIA FOR LONG-RANGE NUCLEAR CONTROL POLICIES. California law review, v. 55, May 1967: 473-492.
LL

It is impossible to see any reliable barriers to future widespread nuclear proliferation. An effective nuclear control policy, although of the highest priority, must not seek to perpetuate the current security arrangements of an essentially bipolar world. By increasing U.S. and Soviet power through nuclear guarantees to nonnuclear powers, the currently proposed nonproliferation treaty will have completely the wrong effect. Perhaps the best way to limit proliferation satisfactorily would be to limit nuclear weapons to regional or other institutional organizations. Such organizations can guarantee a credible and proportionate response to any nuclear aggression against its members. A second criterion for nuclear control is reduction of the symbolic and political usefulness of nuclear weapons and minimization of their effect on international relations. Man must attempt to "deglamorize" nuclear weapons--to cultivate the prestige of nonpossession and shared ownership and encourage an attitude of restraint in those nations already possessing them. A world system in which the use of nuclear weapons is considered illegitimate (except in direct and proportionate retaliation against nuclear attack) would foster such an attitude. Under present conditions of international anarchy proportionate retaliation may in fact be closer to justice among nations than any other response, and could possibly improve international standards of behavior without necessitating the complete reform of mankind. Furthermore by limiting retaliation to only a proportionate response, man can limit the amount of damage if war occurs. The deterrent value of a potentially disproportionate response is reduced under these conditions, but an attacking nation can never be certain its opponent will not change its policy and respond with escalation. Also, an automatic tit-for-tat response could prove more dissuasive than flexibility coupled with a reputation for caution. Finally a nuclear control policy must combine flexibility and permanence. It must be sufficiently adaptable to withstand crises, wars and breaches, and yet negotiable in light of changing national interests. The current nuclear stability rests largely on the "lack of immediate and effective national pressures for proliferation." In the long-range future roughly half the countries of the world may acquire nuclear weapons. Man must seek an intellectual framework that will allow various countries to satisfy their ambitions without jeopardizing world stability.

1519
Koch, Claus. [NONPROLIFERATION--BLIND ALLEYS OF NUCLEAR POLICY] Non-Proliferation--Sackgassen der Atompolitik. Atomzeitalter, no. 4, Apr. 1967: 163-168. P&GP RR
Title varies: Atomzeitalter; Information und Meinung.

Argues that a nuclear nonproliferation treaty not supported by substantial arms control on the part of the great powers would be unacceptable to the nonnuclear nations. Koch criticizes West German policy with regard to the proposed treaty for its reliance on false premises such as national power interests instead of the universal interest of world peace. He points out inconsistencies in the arms control model on which current American security policy rests and which underlies the American draft treaty on nonproliferation.

1520
Law, R. D. INDIA'S ALTERNATIVES. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, Apr. 1967: 56-59.
Z6723.U35, v. 47
"Digested from . . . The Owl (India) Volume XXI, 1965-66, under the title, "Emergence of China as a Nuclear Power."

Since the Chinese nuclear capacity threatens India's security, India must jeopardize its image as an advocate of peace and risk the disapproval of aid-giving nations in order to develop a suitable nuclear deterrent. Developing and producing nuclear weapons and their delivery systems would not only severely burden the Indian economy but could also lead to a dangerous proliferation of nuclear weapons among countries that consider themselves threatened by India. Alternative provisions for nuclear protection include agreements with one or more nuclear countries to provide a nuclear shield in case of attack, protection by the U.N., collaboration with another country similarly threatened to share the cost of nuclear development and production, and intensified research to minimize the delay between decision and production. Since the U.N. could veto aid at a crucial time, and since Japan, the only other advanced country threatened by China, is not likely to engage in development of nuclear weapons, an agreement with the Soviet Union or the United States or both, combined with stepped-up research within India, would provide the best means of countering the Chinese nuclear threat.

1521
Mazlin, D. C. LIVING WITH NUCLEAR PROLIFERATION. Australian Army journal, no. 214, Mar. 1967: 12-18. Ul. A95, 1967

Acceptance of a nuclear nonproliferation treaty and its binding nature can result only from realistic revaluation and redefinition of national objectives in relation to the larger community of nations. This axiom notwithstanding, the probability that more nations will acquire a nuclear capability in the coming years is high. Such disincentives as cost and availability of fissile materials will not preclude proliferation among such nonalined nations as Israel, India, and Sweden. A joint Russian-American nuclear guarantee would be only an incipient measure to prevent these nations from ceasing production of nuclear weapons. The consequences of nuclear proliferation among these and other potentially nuclear countries could range from the disintegration of existing alliances to total world holocaust--though the possibility of a general war in the future would be no higher than it is today. The most significant change brought by proliferation would be an imbalance of power in the world. The evolution of divergent power centers around such new nuclear nations as China would create a multipolar world. Moreover proliferation would increase the possibility of nuclear weapons being used in limited wars between small nations. On the other hand, as each potential country develops a nuclear capability the use of nuclear weapons in a limited war involving a major power may become less attractive; thus the spread of these weapons may help keep specific wars in perspective.

1522
Miki, Takeo. JAPAN'S RESERVATIONS. Survival, v. 9, May 1967: 149-150. U162. S9, v. 9

Excerpt from a speech delivered March 14, 1967, by the Japanese Foreign Minister at a session of the Special Diet.

Postulates that the treaty on nonproliferation of nuclear weapons take into account security requirements of nonnuclear nations, require the nuclear nations to proceed toward nuclear disarmament, eventually leading to a general disarmament, and not discriminate between nuclear and nonnuclear nations.

1523
NEAR AND YET SO FAR. Economist, v. 223, Apr. 29, 1967: 437-438. HG11. E2, v. 223

During the recent disarmament discussions in Geneva it became manifest that the main stumbling block to ratifying the nuclear nonproliferation treaty is the inspection-safeguards question. The U. S. proposal that Euratom continue inspection for a few years is challenged by the nonnuclear five as a subterfuge to put off the inevitable: inspection by the International Atomic Energy Agency, which would be tantamount to "industrial espionage." However, inspection is not the sole source of debate. The fears of the near-nuclear powers, India and Japan, are reflected in their demands concerning the treaty. Neutral India desires some sort of protection guarantee and an assurance that the treaty will not give unfair advantages to the nuclear powers within the strategic and political context of nuclear competition. Such demands may involve an element of bluff, but one thing is certain: a treaty signed without binding provisions on the "vertical proliferation" of the nuclear powers will not remain in effect for long. Some nonnuclear powers, particularly West Germany, advocate a short-term treaty that would be extended only when the nuclear powers have proven their good faith in redressing the "balance of sacrifice." The great powers have paid much lip-service to this demand, but the transparency of these "sacrifices" prevents any decisive, positive change in the ratification talks.

1524
Nenadic, A. MARKO NIKEZIC IN SCANDINAVIA. Review of international affairs, v. 18, June 5, 1967: 7-8. D839. R4, v. 18

Describes the visit of the Yugoslav State Secretary for Foreign Affairs, Marko Nikezic, to the Scandinavian countries. The author notes that the Scandinavians are especially interested in disarmament and nonproliferation, actively support efforts for general disarmament, and believe that the Moscow Treaty banning nuclear tests should include a ban on underground tests.

1525
Orlov, V. 'YES,' THAT IS, 'NO.' Current digest of the Soviet press, v. 19, May 17, 1967: 25. D839. C87, v. 19
Translated from Izvestiia, Apr. 30, 1967, p. 3. Slav Rm

A recent speech by Foreign Minister Willy Brandt on the West German attitude toward the nuclear nonproliferation treaty might have caused someone who was unfamiliar with Bonn's verbal casuistry to believe that West Germany is ready to sign the treaty as soon as it is asked to do so. That of course is not the case. In fact West Germany has not abandoned its nuclear ambitions. Other members of the West German Government, namely Schröder and Strauss, openly and categorically demand nuclear weapons for West Germany, and they are supported by the West German press. Moreover in the recent trilateral U. S.-British-West German negotiations on maintaining British troops on West German territory, the Germans pressed for concessions in the nuclear weapon field, thus disproving their claims that they were undeservedly accused, at the Karlovy Vary Conference of European Communist and Workers' Parties, of maintaining a revanchist policy toward Eastern Europe.

1526
Perret-Gentil, Jacques. [A WORLD PROBLEM--URANIUM RESOURCES AND THE NEW NUCLEAR COUNTRIES] Ein Weltproblem--die Uraniumvorkommen und die neuen Atomländer [by Jacques Pergent] Osterreichische militärische Zeitschrift, v. 5, Mar./Apr. 1967: 97-101. P&GP RR

Besides the United States, the Soviet Union, Great Britain, France, and Red China--each engaged in military and peaceful nuclear activities--there are 13 states involved in the development of nuclear energy and 8 more that will have peaceful nuclear capabilities in the near future. Given their capabilities in terms of the number of nuclear reactors and/or potential volume of electricity produced, the two latter groups can already be called "nuclear" despite their declared intentions to restrict themselves to

civil applications of atomic energy; for the technological prerequisites for peaceful and military uses do not differ greatly. Within 5 years of criticality of a nation's first nuclear reactor that nation is "automatically in a position, both theoretically and practically, to produce atomic bombs." In addition there are seven other states, each with adequate uranium resources and nuclear technology to qualify as nuclear states at some later date. Whatever the orientation of a country's nuclear activity the importance of uranium resources for a nation's industrial (read "nuclear") status cannot be overestimated. Crucial in that respect is the cost factor of uranium production. Only ores with uranium content higher than 1 percent can be profitably excavated. But if uranium appears in combination with gold, as in South Africa, or with phosphates, as in Morocco, a radically lower content ratio suffices for workable production. With a rapid increase of the electric-power output from nuclear energy expected in the 70's the world's uranium resources will be heavily taxed. By 1980 about 150,000 MWE globally will be produced from nuclear energy. The situation will certainly be alleviated somewhat by a more extensive use of fast breeding reactors. Feasible also--although in the more distant future--is profitable extraction of uranium from sea water. In the meantime worldwide prospecting for still-undiscovered ore deposits with adequate uranium content continues. By the year 2,000 global uranium demand will reach about 1.5 million tons, half of the free world's estimated profitable uranium resources and one-fourth of its total uranium ore.

1527
Rosen, Steven. PROLIFERATION TREATY CONTROLS AND THE IAEA. Journal of conflict resolution, v. 11, June 1967: 168-175. JX1901.J6, v. 11

The greatest obstacle to ratification of the nuclear nonproliferation treaty is the question of inspection and safeguards. The United States has proposed International Atomic Energy Agency [IAEA] controls, while the Soviet Union favors a general commitment by the signatory states not to aid nonnuclear powers in the development of nuclear weapons. Although the Soviet Union provides for controls in its atoms-for-peace contracts with other states (mostly Communist) "the clandestine and implicit nature of Soviet controls allows the U.S.S.R." to plead national sovereignty and refuse inspection by IAEA or any other international authority. The U.S. proposal of IAEA inspection may become a liability for U.S. negotiators. It is questionable whether the IAEA is technically ready to handle the task of widespread inspection. At present it is suffering from a lack of funds, and its inspection staff consists of only eight members. Also it is doubtful that the Soviet Union will accept IAEA inspection under the terms of the treaty. Ratification of the treaty would best be served if inspection controls were supervised by multiple control mechanisms (European Atomic Energy Community, U.S. Atomic Energy Commission, CIA, etc.). However the United States should continue to transfer its bilateral safeguards to IAEA so that the Agency can be strenghtened and gradually assume arms control tasks in the future. This is better than involving the Agency in "the controversial politics of the proliferation treaty."

1528
Scheuch, Manfred. [FEWER NUCLEAR POWERS--MORE SECURITY] Weniger Atommächte--mehr Sicherheit. Die Zukunft, no. 6, Mar. 1967: 20-21. H5.Z85, 1967

Criticism of West German arguments against the treaty on nonproliferation of nuclear weapons. Scheuch points out that the treaty would most substantially contribute to the preservation of world peace. This consideration alone should outweigh all its possible disadvantages, for no higher political goal than peace exists. West German fears that the treaty would secure a Soviet-American power monopoly are unrealistic. It would change nothing in the existing balance of power, which in recent years has been marked by increasing independence of lesser nations from the policies of the United States and the Soviet Union.

1529
Seuberlich, H. E. [THE AMERICAN THEORY OF ESCALATION AND THE NONPROLIFERATION TREATY] Die Eskalations-Theorie der USA und der Non-Proliferation-Vertrag. Wehrkunde, v. 16, June 1967: 281-288. U3.W396, v. 16

Considers American nuclear-escalation theory functional to United States politics. Seuberlich contends that the proposed nonproliferation treaty would crystallize the existing nuclear industrial oligarchy in the world to the detriment of the interests of nonnuclear nations, which would be hampered in the full development of their own peaceful nuclear programs. The author urges that all nuclear signatories of a nonproliferation treaty be subjected by the treaty to the same international control as the nonnuclear nations.

1530
Shragin, V., L. Zavialov, and D. Lvov. SOVIET COMMENTS. Survival, v. 9, May 1967: 150-151, 168. U162.S9, v. 9

Abridgement of "a translation provided by the BBC Monitoring Service."

A panel discussion between V. Shragin, L. Zavialov and D. Lvov, broadcast March 19, 1967, over Soviet radio, on the proposed treaty for nonproliferation of nuclear weapons. The panelists point out Bonn's obstructionism with regard to the treaty, motivated by West German imperialist ambitions. They also consider the reservations of other nonnuclear countries about the treaty, and the safeguards for peaceful use of atomic energy provided by the treaty.

1531
Shub, Anatole. NON-PROLIFERATION FOR NON-SCIENTISTS. Encounter, v. 28, May 1967: 85-90. AP4.E44, v. 28

The proposed nonproliferation treaty tabled in Geneva last fall is designed primarily to promote collaboration between the United States and the Soviet Union. Both nations recognize that the primary cold war problem, Germany, is not easily resolved, but they hope the settlement of more limited problems elsewhere in the world will gradually build an atmosphere favorable to settlement in Europe. This desire for better understanding between the two nations is a direct reaction to disturbing experiences they have had in recent years. For the United States this experience was the 1962 Cuban missile crisis, which shattered its confident assumption that Russia would never yield control of nuclear weapons to any of its allies or clients. The nonproliferation treaty represents an American attempt to formalize Russia's de facto abstention from nuclear sharing through the

authority of international law. Growing Western military power and the unrelenting drive of some West German leaders to obtain nuclear weapons are responsible for the evolution of Russia's attitude. The 1954 agreement permitting West German conventional rearmament did not prevent installation of nuclear weapons in West Germany under the "two-key" system, nor German and American demands for nuclear sharing in NATO. Throughout the past 10 years Franz Josef Strauss and his supporters have sought bilateral arrangements with France for atomic cooperation, and Ludwig Erhard recently admitted to having proposed a Franco-German nuclear force to De Gaulle in 1964, and, when that was rejected, joint missile development. To the United States Bonn's nuclear strivings often seem of marginal importance in the world power balance, but to Russia the disastrous experiences of this century's two German invasions remain vivid. Despite U.S. assurances that Germany will not receive American nuclear arms, the Soviets cannot be certain that Ronald Reagan and Franz Josef Strauss will not lead the United States and West Germany in 1969. While the Americans fret about inspection and other technical problems, Russia's sole concern is the signature of West Germany on the nonproliferation treaty. For this Moscow has made a major concession--international inspection on the territory of Communist states. The crucial test of American intentions will be whether Washington gives priority to its alliance with Bonn or to its dialogue with Moscow.

1532
Sommer, Theo. [GERMAN NUCLEAR POLICY] Deutsche Nuklearpolitik. Österreichische Zeitschrift für Aussenpolitik, v. 7, no. 1, 1967: 26-39.
DB47.O43, v. 7

The Bonn government does not want nuclear weapons, as many foreigners claim. But observers still have doubts about Bonn's sincerity in its renunciation of nuclear arms production, and wonder why it is still requesting "nuclear sharing" and has mental reservations about the nuclear nonproliferation treaty. The problem of nuclear sharing developed when nuclear weapons started to play a role in NATO defense planning in 1956 to 1958. With deployment of of tactical nuclear arms in West Germany, the country became increasingly dependent on American decisionmaking. Growing inconsistencies in American deterrence strategy, as well as contradictions between U.S. defense planning and its disarmament objectives, prompted the Adenauer government to look for a solution in the further integration of nuclear weapons within NATO. Consequently Bonn fully supported Gen. Norstad's plans for making NATO the "fourth nuclear power." This idea along with a later one, the Multilateral Nuclear Force [MLF], never materialized, partly due to opposition in West Germany itself to any physical control of nuclear hardware by Germans. While subscribing to the idea of nonproliferation of nuclear weapons, the Erhard government considered a comprehensive treaty "an inappropriate means to that purpose." However, it was ready to sign any treaty that would leave open certain options, none of which concerned Germany's "nuclear independence." The position of the Kiesinger government in this matter is likely to be less dogmatic than Erhard's and therefore more effective. Public opinion polls in West Germany indicate a generally negative attitude towards the idea of the nation's nuclear armament. But the German attitude may change radically if nuclear armament should become commonplace, especially if, for example, Poland should acquire nuclear weapons.

1533
Sommer, Theo. GERMANY'S RESERVATIONS. Survival, v. 9, May 1967: 144-146.
U162.S9, v. 9
Reprinted from Die Zeit, Feb. 24, 1967.
AP30.Z39

With a growing tendency among NATO members towards a greater national freedom of decision in the area of foreign and defense policies, it is natural that West Germany's attitude with regard to a proposed nuclear nonproliferation treaty is primarily concerned with protecting its own interests. Unfortunately demagogic attacks on the treaty by some German leaders undermine the Bonn government's serious efforts to reach a détente with East Europe, and distort the nation's image abroad. Nevertheless, the government should be seriously concerned with guarding its legitimate interest "in the unhampered development of peaceful German nuclear research and of the nuclear power industry." This is essential for the country's industrial progress. No bilateral or multilateral restriction of Germany in this respect should be permitted or be accepted by Bonn. Furthermore, the German Federal Republic cannot possibly sign a treaty, the essential points of which (e.g., distinction between "civil nuclear and military nuclear research") lend themselves to a vast difference of interpretation by the East and the West. A nonproliferation treaty to which West Germany could be a party must specify in exact terms "the methods and the scope of inspection." It must also be preceded by an American guarantee that nuclear fuel deliveries to West Germany will continue. To allay foreign fears as to its intentions the German Federal Republic should renounce "the production of German atomic weapons on foreign soil and the purchase of such weapons from other states"--this as a supplement to the 1954 renunciation by Bonn of nuclear arms production in Germany.

1534
Spaak, Paul-Henri. NON-PROLIFERATION: EUROPE, DEFEND YOURSELF. Spectator, v. 218, Apr. 28, 1967: 482. AP4.S7, v. 218

A nonproliferation treaty is of indisputable importance to world security, but Americans and Russians must recognize its impact on Europe. The treaty requires the whole world to recognize U.S. and Soviet military superiority and political preponderance. Europeans understandably view this situation with a certain melancholy as the price they must pay for the folly of originating two world wars. Yet while Europe's military power is negligible and its political influence is waning, it still retains power in the industrial and commercial fields and in the area of social justice. However, in order to advance in these fields, all Europe, including Great Britain, must be united. Enormous interests are at stake; if Europe accepts military discrimination, it is inconceivable that it can agree to any other form of discrimination. While it will renounce manufacture of atomic bombs, it will not accept limitation on scientific or industrial activities in the nuclear field. The proposed nonproliferation treaty is unacceptable, for it requires controls in Europe which the Russians and Americans refuse to accept on their own territory. The current proposals involve "unjustified

discrimination in the field of the peaceful exploitation of atomic energy." Only a united stand by the European nations can induce the superpowers to change their views. If the "brutal revelation of their inferior position" can rouse and unite Europe, some good may come out of this unfortunate situation.

1535
Tatebayashi, Chisato. JSP ATTITUDE TOWARD A NON-PROLIFERATION OF NUCLEAR WEAPONS TREATY. Japan socialist review, no. 132, May 15, 1967: 7-28. HX9.J3, 1967

Discusses the negotiations toward a nonproliferation treaty at the 18-Nation Disarmament Conference in Geneva, the attitudes of the member nations, and the views of other major nations including West Germany, France, and Communist China. Tatebayashi sees many unresolved problems created by the proposed treaty, including its relation to nuclear disarmament, security arrangements to safeguard nonnuclear nations, allowance for the peaceful use of atomic energy, and provision for international inspection. He questions the right of the nuclear powers to veto proposed amendments to the treaty and the lack of restrictions on and guaranteed monopolistic positions of the United States and Soviet Union. Japan's endorsement of the spirit of the treaty indicates its recognition and concern for the problem of stopping proliferation, but the present draft treaty needs reexamination.

1536
TREATY NOT FOR SIGNING [editorial] Nature (London) v. 214, May 20, 1967: 753-754. Q1.N2, v. 214

Optimism about ratification of the nuclear nonproliferation treaty is decreasing in direct proportion to the increasing problems among the primary powers involved. The basic problem confronting the powers is the proposal that Euratom undertake the responsibilities for safeguards and inspection which normally would be delegated to the International Atomic Energy Agency in Vienna. Some European countries, particularly Italy and West Germany, fear inspection of civil reactors under the Vienna system would lead to "industrial espionage." The U.S. proposal--that after a 3-year transition period Euratom procedures be adopted to international use--was designed to assuage these fears. The nonnuclear powers can not and should not be expected to accept a treaty that could compromise their basic sovereignty. It would be politically impossible for these nations to submit to a type of military nuclear subservience--to be subjected to nuclear blackmail on a political and psychological level by the nuclear powers. The strategic competition between the great powers underlines the precarious nature of any agreement whereby one power would subject itself through international agreement to the will of another. Yet this restriction may be accepted if the nuclear powers, in agreeing to a treaty, relinquish some of their nuclear monopoly. It appears today that the only real solution to these problems depends on the resolution of questions of sovereignty and preeminence. Only when these questions have been squarely faced and resolved can there be ratification of a nonproliferation treaty.

4. Other (Accidential War, Command and Control of Weapons, etc.)

C. REGIONAL

1. Tension Areas

1537
Brzezinski, Zbigniew. [EUROPE AND THE GERMAN QUESTION] Europa und die deutsche Frage. Osterreichische Zeitschrift für Aussenpolitik, v. 7, no. 1, 1967: 4-15. DB47.O43, v. 7

Compelling moral and political reasons, including some which transcend the German problem itself, point to the absolute necessity of the West's resolute pursuit of German reunification. Any solution to the German problem that would consolidate the division of Germany cannot possibly reduce tensions in Europe, which are themselves nurtured by such a division. Since these tensions will remain as long as Europe is partitioned, a program aimed at an end to both Germany's and Europe's partitions must be sought within a framework broad enough to secure "America's as well as Europe's support" in its realization. The program should take into account the full spectrum of interests involved and should avoid steps adverse to either German or European reunification. Efforts to bridge the European schism through measures effecting "a gradual revalorization of [Germany's Soviet] Zone State" would then be contrary to such a policy. The elimination of misunderstandings and doubts about West Germany's long-range national goals is important for the success of a reunification policy. Some uneasiness on this score, e.g., suspicions about possible Bonn deals with Moscow and East European fear of Germany, has been conditioned by past historical experience. Among the other problems to be considered in a reunification policy are the legitimate security interests of West Germany and Western Europe and their repercussions on Eastern Europe with regard to an East-West détente. For instance, a possible multilateral ABM system for West European defense might serve the purpose better than the MLF would have (had the latter materialized), since it would be defensive, both technically and politically. There is no other way to start working for East-West accommodation in Europe except on the basis of existing boundaries and the status quo. The latter only changes slowly, but it nevertheless does change. There is a chance now for a gradual change in East-West relations that would eventually produce conditions ripe for reunification. This chance can best be exploited by a multilateral effort involving both the United States and the Soviet Union. European reunification should become an actively pursued goal of the Atlantic alliance. Its members could start off with a new, much larger scale "Marshall Plan" that would be a multilateral East-West economic endeavor.

1538
Daniel, Jean. [THE IMPASSE OF REVENGE] L'impasse de la revanche. Nouvel observateur, no. 136, June 21-27, 1967: 10-11. AP20.O2, 1967

Prospects for a peaceable solution of the situation in the Middle East are dim. Arab leaders refuse to negotiate with Israel and seek to destroy it. Already Russian arms shipments are flowing into Egypt, supporting new hopes for victory born of despair and the refusal to accept defeat. Should war break out, Russia, which has suffered an enormous diplomatic defeat, will not back down once more and there would be an increased probability of total global war. Of the great powers only France has refused to take sides. France

refuses to aid Israel, while at the same time rejecting Communist demands to destroy it.

1539
Deutsches Institut für Zeitgeschichte. THE DIVISION OF GERMANY AND THE ROAD TO REUNIFICATION: A DOCUMENTARY SURVEY. [Berlin?] National Council of the National Front of Democratic Germany [1966] 116 p. DD257.5.D435
Bibliography: p. 105-116.

Contents.--1945-1949: The road to division.--1949-1955: All-German elections or remilitarization and incorporation in NATO.--1956-1966: Understanding through peaceful coexistence or deepening the division through atomic armament.

Criticizes the policy of the West, particularly of West Germany, with regard to the Germany problem and European security. Excerpts and summaries of official pronouncements by East Germany, the German Federal Republic, the Soviet Union, the United States, Great Britain, and France on those problems are included.

1540
Geisenheyner, Stefan. ACCELERATING HOSTILITY IN THE MIDDLE EAST. Air Force and space digest, v. 50, Mar. 1967: 16-19. illus.
UG633.A65, v. 50

Describes the arms race in the Middle East and the objectives and political motivations of the Arab States, Israel, Red China, and the East and West blocs in this region. The author believes that the main cause of the arms race in the Middle East is the Arab plan to destroy the last vestige of the West--Israel--and create a pan-Arabian federation. The realization of this plan by the Arab States entails a massive military construction and aid program, to which Israel has responded with a buildup program of its own. The author hopes that when both sides achieve a nuclear capability, a status quo leading to peaceful coexistence will be attained.

1541
Halperin, Morton H., ed. SINO-SOVIET RELATIONS AND ARMS CONTROL. Cambridge, Mass., M.I.T. Press [c1967] 342 p.
JX1974.H263

Contents.--Introduction, by Morton H. Halperin.--Chinese views on the spread of nuclear weapons, by Oran R. Young.--Arms control: can China be ignored? by Jeremy J. Stone.--The Chinese factor in Soviet disarmament policy, by Helmut Sonnenfeldt.--Sino-Soviet nuclear relations, 1957-1960, by Morton H. Halperin.--The nuclear test ban and Sino-Soviet relations, by Walter C. Clemens, Jr.--The Chinese attitude, by Harold C. Hinton.--The Soviet attitude, by Malcolm Mackintosh.--The American attitude, by George H. Quester.--The 1958 Quemoy crisis, by Morton H. Halperin and Tang Tsou.--Appendices.--Index.

Assesses the relevance of the Sino-Soviet dispute to the issue of arms control and suggests future directions for U.S. policy. Young, Stone, and Sonnenfeldt discuss the impact of the Sino-Soviet dispute on the arms control policies of China, the United States, and the Soviet Union. The next two papers, by Halperin and Clemens, examine the impact of Chinese pressures on the direction of Soviet disarmament policy and on the negotiations concerning the nuclear test ban treaty, and the impact of these negotiations on Sino-Soviet relations. The final four essays deal with the question of Sino-Soviet relations during a possible Sino-American crisis, each of the first three approaching the problem from a single nation's point of view, and the fourth considering in detail the 1958 Quemoy crisis.

1542
Harrigan, Anthony. CRISIS IN RED SEA AREA HOLDS PORTENT FOR U.S. NAVY. Navy, v. 10, June 1967: 12-15. illus. VA49.N28, v. 10

Trouble is brewing in the Red Sea-South Arabia-Horn of Africa region that will necessitate new efforts on the part of American seapower to keep the peace. Once the British withdraw from Aden the crisis may come to a head. Already Egyptian-masterminded unrest gains momentum in the streets of Aden, while across the Red Sea in French Somaliland and on the Eritrean coast of Ethiopia dissension is rife. If Egypt gains control of Aden, Somalia occupies French Somaliland, Nasser moves from his new base at Aden toward the Persian Gulf states, and the Soviets gain naval-base rights at Aden, Ethiopia, and the Republic of the Sudan may well go to the Soviets as they move to fill the power vacuum left by the British. The oil resources of the Middle East, of vast strategic significance to the United States, will then be in danger. A U.S. Indian Ocean fleet is needed to meet this prospective crisis, but too few warships exist at present. An interim solution to meet the ship shortage and yet live up to U.S. responsibility in this area would be the conversion of a battleship to a commando ship. A currently mothballed ship could be ready within a year if work were started promptly. Its big guns could prove a powerful deterrent to revolutionary forces on the coasts of the Red Sea and adjacent areas.

1543
Harrigan, Anthony. LESSON FOR U.S. IN MIDEAST WAR: WE MUST BEEF UP NAVAL POWER IN MEDITERRANEAN AND 'EAST OF SUEZ.' Navy, v. 10, July 1967: 9-11. illus.
VA49.N28, v. 10

The United States Navy must augment its Mediterranean fleet in order to meet the challenge of the Soviet Navy. Rapid deployment of U.S. troops to strategic points in the Middle East could have prevented an Arab-Israeli war. Russian naval strength in the Middle East is now becoming a threat to stability and peace. Its objective is "to cut off Arab oil-producing countries from Western Europe and North America." With the impending withdrawal of British troops "East of Suez" the United States must maintain an effective deterrent to prevent Communist takeovers not only in the Arab world but also in Northern and Northeastern Africa.

1544
Humbert-Droz, Jules. IS EUROPEAN SECURITY POSSIBLE? Review of international affairs, v. 18, May 20, 1967: 9-12. D839.R4, v. 18

The success of European security and cooperation depends upon the successful resolution of political problems inherited from the "peace" between the great powers after the Second World War. These problems have engendered a high level of tension during the cold war in Europe. They revolve around

an East-West settlement that would recognize Germany's disputed frontiers and eliminate what today is termed an artificial division. The reunification of Germany should include specific guarantees by West Germany to its eastern counterpart: recognition of the German-Polish boundary along the Oder-Neisse River, permission to reorganize the German Communist Party and to continue its existence in a united Germany, withdrawl of occupation troops, and Germany's admission as one state into the United Nations. However, the resolution of the German problem is a maximal objective, to be achieved only when and if other, equally perplexing problems are solved. Included is the liquidation of both military blocs in Europe, which would reduce international tensions and minimize possibilities of miscalculating resolve in politically volatile areas. A simple nonaggression pact between the two military organizations would only enhance the consolidation of the blocs and inhibit nations from courses of action independent of their respective political and military alliance. The question of arms control and disarmament also is vital, not only to the security of Europe but to its very existence. Any armaments race between independent European countries would inevitably lead to new tensions and preclude meaningful negotiations and discussions of European problems. Development of the United Nations into an effective world parliament, reenforced by an international arbitration commission that could prevent disputes from becoming major conflagrations, should be inextricably tied to any talks on the question of European security.

1545
Imhoff, Christoph von. [ONE-HUNDRED WAR-HOURS CHANGE THE NEAR EAST] Hundert Kriegsstunden verändern den Nahen Osten. Aussenpolitik, v. 18, July 1967: 422-433. D839.A885, v. 18

Analysis of the latest Arab-Israeli war (June 1967). Imhoff gives historical background of the war and describes Soviet political intentions by pointing out that Moscow counted on a long war which would increase its political influence in the Near East and among uncommitted nations with simultaneous radical decrease of American prestige and "presence" there. This, the Soviets hoped, would prompt Washington to make important concessions to the Soviet Union in other fields. Imhoff thinks the Arab-Israeli conflict proved that superpowers become politically weakened by small wars, in which they are bystanders on opposite sides instead of in "the same boat." The only viable solution to the Near East crisis would be a Soviet-American guarantee of the Israeli boundaries and recognition of the latter by the Arab states.

1546
Law, John. A REGION SLIPPING TO RUSSIA--AND U.S. HAS A BIG STAKE. U.S. news & world report, v. 62, June 5, 1967: 32-35. map. JK1.U65, v. 62

The Soviet Union has mixed diplomacy and subversion to achieve notable gains in the Middle East, even in traditionally pro-Western areas. The Russians have signed economic agreements with both Iran and Turkey. The principal Soviet allies in the Middle East--Yemen, Syria, and Egypt--are attempting to subvert the pro-Western governments of Saudi Arabia, Jordan, and South Arabia with harassment tactics backed by Russian arms. Russia is also exploiting anti-American feelings in Iraq and Lebanon and increasing its seapower in the Mediterranean. Prospects are bright for increased Soviet influence in the Middle East because the Russians can act more freely in an area less vital to their economic and strategic interests than to those of the West. Their Arab allies are militarily the strongest states in the Middle East, and cooperation is improving among them. Moreover Moscow does not have to consider the effect on Israel of Soviet-Arab relations. Despite the more than $7 billion worth of aid Washington has poured into the Middle East and the Central Treaty Organization alliance formed to thwart Soviet attack, Russia has successfully weakened Western influence in that area.

1547
Morse, F. Bradford. IS PEACE POSSIBLE? Vital speeches of the day, v. 33, May 15, 1967: 452-455. PN6121.V52, v. 33

"Delivered by F. Bradford Morse, United States House of Representatives, before the Immigrants Mutual Aid Society, Boston, Mass., March 12, 1967."

The "highly inflammable" situation that exists between Israel and the Arab nations in the Middle East poses serious problems for the United States. On the one hand the United States feels bound to Israel through a common heritage and strategic interests; on the other hand it hesitates to alienate the Arab nations and jeopardize the Middle Eastern oil supply. The aims of U.S. policy are to preserve the uneasy truce between the two sides and to deny the area to the Communists. The United States has attempted to encourage economic development within the nations while disengaging itself from local quarrels. However the acquisition of increasingly sophisticated arms in the area and the problems created by division of Arab nations into two rival camps have combined to force Washington into a more active role. Time has increased rather than moderated the causes of Arab-Israeli tensions. Arab territorial demands range from the total elimination of the State of Israel to territorial adjustments on the 1947 U.N.-set boundaries. The Palestinian refugees remain a continuing source of friction. Border raids and retaliations have persisted despite the presence of U.N. truce teams. Soviet supply of arms to Egypt, countered by Western shipments to Israel, have intensified the arms race. The conflict is so deep-rooted, long-established, and emotional in character that settlement cannot be imposed from the outside; it must come from within, admittedly a slow process. To improve the prospects of peace in the Middle East the United States should reconvene the Tripartite Guarantee Powers to "reassert the commitment to guarantee boundaries and armistice lines," and should seek agreement with the Soviet Union on the limitation of arms shipments. In all its efforts the Nation should seek the support and participation of the United Nations.

1548
Petković, Ranko. WAR AND PEACE. Review of international affairs, v. 18, June 20, 1967: 3-4. D639.R4, v. 18

The fact that Israel could successfully carry out its military undertaking against the Arab states proves that Western, aggression-minded forces found the situation favorable for an attempt to change the balance of power to their advantage and maintain world supremacy without provoking a nuclear confrontation. On the pretext of self-defense, Israel was supposed to destroy the progressive regimes in Syria and Egypt. Israel seeks "Lebensraum," and it easily fell into the

error of thinking that it could attain its aims and enlarge its territory by force. By his open and decisive condemnation of the Israeli aggression, President Tito has proved that he is a real revolutionary. His views are in accordance with the opinions of the seven communist countries that signed the Moscow Declaration against Israeli aggression and he enjoys the support of many nonalined countries. Although the possibility of more fighting between the Israelis and Arabs cannot be dismissed, the most important matter in the present crisis is the political struggle for settlement of the whole Near Eastern problem. Undoubtedly the United Nations, despite its failure to prevent the war, is the most competent forum for discussion and solution of the problem. This is one of the most difficult tasks it has ever encountered. It must prevent Israel and its protectors from blackmailing the victims of aggression and the entire progressive world. The United Nations must also prevent the legalization of war as an instrument of political aims. It must make sure that aggression like that in Vietnam and the Near East will not occur in the future. Today it is not only the future of Vietnam, Greece, or Egypt that is at stake, but the life or death of mankind. That is why the responsibilities of the United Nations and its members should be thoroughly understood before it is too late.

1549
Simon, Albert K. EUROPE'S SECOND LITTLE ENTENTE: PANKOW-WARSAW-PRAGUE. Central Europe journal, v. 15, May 1967: 151-154.
DB200.7.S74, v. 15

Karl Albert Simon draws attention to the striking similarity between post World War I's Little Entente as created by Edvard Beneš, consisting of Czechoslovakia, Rumania and Yugoslavia, which was to serve the Czechs as a guaranty for their leadership role in Central Europe and preclude any return of the Hapsburg Monarchy, and the Iron Triangle of Antonin Novotny between the Czechs, Poles and the "GDR." This Entente, the author further points out, could only last as long as the German Reich lay prostrate and England, France and Italy and the Soviet Union saw no need to renew partnership with Germany. He shows how Beneš could have complemented his system of the Little Entente by one of alliance with the German Reich, first providing for Sudeten German autonomy, then establishing a new Czech-German policy, subsequently making peace between the Poles and the German Reich. As it worked out, the big Four signed the Munich pact in 1938 and within a few weeks the Little Entente was but a memory. Antonin Novotny, says Mr. Simon, set out in 1967 to do a repeat performance by linking Poland and the "German Democratic Republic" with his CSSR against Germany in an iron triangle resembling the Little Entente. This Entente No. 2 can also endure only until Germany coordinates its interests with Russia or the Western Powers. "The isolation of the second Little Entente within the framework of a new Western and German policy toward the East would be the sole logical answer in the interest of the West and of Germany, to the contractual agreements between Prague, Warsaw and Pankow." (Abstract supplied)

1550
Sztucki, Jerzy. [EUROPEAN SECURITY AND THE GERMAN QUESTION FROM THE POLISH VIEWPOINT] Europas Sicherheit und die deutsche Frage aus polnischer Sicht. Blätter für deutsche und internationale Politik, v. 12, Jan. 1967: 27-34.
D839.B57, v. 12

Today's world lives under the constant threat of global nuclear war that might develop from local military conflict. The most ominous threat is in Europe, where any military conflict involving Germany would in no time become atomic world war. The Potsdam Conference saw elimination of the German threat to Germany's neighbors as a prerequisite for permanent peace in Europe. But Bonn rejects as unacceptable the territorial and political configuration of Europe resulting from Germany's loss of the war and refuses to recognize the Potsdam Agreement or the final character of Poland's western boundary along the Oder-Neisse Line. The implications of such a position transcend the boundary problem itself. Due to existing alliances the German Federal Republic's claims can lead directly to world war, the more so since none of Bonn's allies but France have yet recognized Poland's western boundary as final. Of the nonnuclear states in Europe only West Germany "has made its access to atomic weapons a cardinal point of its political program." Evident therein is the dangerous convergence of Bonn's military aspirations and political claims, West German protestations of peaceful intentions notwithstanding. During its entire existence the German Federal Republic has strongly opposed East-West détente and international disarmament on the absurd ground that these must be preceded by German reunification. Yet, the only prospects for German reunification lie in East-West détente, starting with normalization of relations between both German states and Bonn's recognition of the territorial status quo in Europe. A nonaggression pact between NATO and the Warsaw Treaty Organization, as proposed by Poland, a dissolution of those alliances, or acceptance of various arms control and disarmament measures might prove conducive to détente.

1551
Van Staaveren, Jacob, and Herman S. Wolk. SOUTHEAST ASIA POLITICAL-MILITARY CHRONOLOGY 1948-1967. Air Force and space digest, v. 50, Mar. 1967: 137-138, 141-142. illus.
UG633.A65, v. 50

A chronological list of the events that have taken place in Southeast Asia, especially South Vietnam, between 1948 and 1967.

2. Disengagement, Neutralization, etc.

1552
Buzzard, Sir Anthony. HOW TO DISENGAGE. Statist, v. 191, Apr. 7, 1967: 696.
HG11.S8, v. 191

To Russia and China, America's superior nuclear capability and its land and sea bases near them are extremely threatening. On the other hand, the West fears Russia's and China's ability to deploy conventional forces more quickly and in larger numbers anywhere around the Iron Curtain. These asymmetries in military power breed tension and hinder progress in disarmament and the solution of proliferation problems. The West's reliance on the first use of nuclear weapons causes Germany and India to desire control of them, since these front line countries fear that the nuclear powers will not use nuclear weapons first on their behalf. Nuclear guarantees would be more credible if they were only needed for second use, i.e., if there were a balance of conventional forces on either side of the Iron Curtain. In order to establish this balance in Central Europe, where it is most important, Russia and the West should agree not to reinforce their present 22-24 divisions there and to remove

some of their tactical atomic weapons from the area in accord with the Rapacki-Gomulka proposals. The West should also offer to destroy more of its means of delivery and to keep Polaris submarines out of the Mediterranean. The balanced conventional strength should be related mainly to tanks, as they are the most powerful conventional weapons and the easiest to inspect. Tactical atomic weapons should be related to fighter-bombers and light bombers for similar reasons. Aside from observation posts at communication centers, little inspection is necessary, and there should be no inspection inside Russia itself. Germany will object to this settlement for political reasons, but she will have to be persuaded that it is not discriminatory: that these limitations are necessary due to her geography, not her history, that acceptance of the military status quo is not the same as acceptance of the political status quo, and that any arms control agreement depends on the solution of the German problem. Many Germans have shown more moderation lately in these matters, therefore now is the time to start a nonpolitical dialogue on the above-mentioned subjects. The recent British Defense White Paper supports the mutual reduction of the forces of the NATO and Warsaw Pact members. However the unilateral withdrawal of British forces from Germany will not strengthen the West's position during the negotiations for an arms control agreement.

1553
Hudson, Richard. LATIN AMERICA WITHOUT NUCLEAR WEAPONS: THE FIRST TREATY ON DENUCLEARIZED ZONES. Disarmament, no. 13, Mar. 1967: 1-4. JX1981.P7D5, 1967

According to U. N. Secretary General U Thant, the treaty for the prohibition of nuclear weapons in Latin America is "an important milestone in the long and difficult search for disarmament." The initial impetus for the treaty came from former Mexican President Adolfo López Mateos, and by April 1963 it was supported by the Presidents of Bolivia, Brazil, Chile, Ecuador, and Mexico. By spring of 1966 most of the treaty language was agreed upon. A major obstacle to its final acceptance was the question of how many nations had to ratify the treaty before it went into effect. In early 1967 a compromise was found, permitting some states to reserve the treaty's applicability until ratification by all states, but allowing those states willing to waive that requirement to accept the treaty immediately. In addition, six outside powers were invited to sign two protocols, requiring those with territories in the area to keep them free of nuclear weapons and to refrain from supplying or contributing to the spread of nuclear weapons in Latin America. The United States has indicated a desire to exclude Puerto Rico and the Virgin Islands from the first protocol but will probably sign the second. The Soviet Union is reserving judgement until the other nuclear powers act. Britain's reaction has been encouraging, but France, while sympathetic to the treaty, considers Martinique and Guadalupe constitutionally an integral part of France. China expressed sympathy with the treaty's purpose, but refused to be involved in an effort begun at the United Nations. The Netherlands was unequivocally enthusiastic and willing to sign. Concerning controls, each party to the treaty will agree to IAEA safeguards, and the five man Council of the Agency for the Prohibition of Nuclear Weapons in Latin America will be empowered to order inspections. Violations which might endanger peace and security will be reported to both the United Nations and the Organization of American States. Until a nuclear device suitable for peacetime uses is developed, most interpretations of the treaty rule that all nuclear explosions, including those allegedly for peaceful purposes, are barred.

1554
Hudson, Richard. LATIN AMERICANS SIGN TREATY TO PROHIBIT NUCLEAR WEAPONS. War/peace report, v. 7, Apr. 1967: 15-16.
P&GP RR

The Treaty for the Prohibition of Nuclear Weapons in Latin America represents a milestone in nuclear disarmament. The resulting nuclear-free zone covers more than 20 countries. Despite the rejection of the treaty by Cuba and some extracontinental countries an effective compromise has been formulated among the participating countries. Each signatory has the right to choose whether it desires to be bound by the treaty. Mexico, for example, decided to waive the requirement for unanimous acceptance and obligated itself immediately. The treaty, which prohibits even peaceful explosions of nuclear devices, creates a General Conference that appoints a six-member Council. Member countries suspected of violations are required to submit to on-the-spot inspections, and violations are reported to the United Nations and the Organization of American States. If there is any residue of hope of extricating the world from the trap of nuclear holocaust the Latin American countries have supplied it.

1555
Solvhoj, Hans. NEW PERSPECTIVES OF EUROPEAN COOPERATION. Review of international affairs, v. 18, July 5-20, 1967: 12-14.
D839.R4, v. 18

Discusses the probability of European cooperation and security. Unlike the situation a decade ago, Western Europe desires closer ties and understanding with Eastern Europe. However before there can be effective cooperation the problems of Germany, proliferation, and military alliances must be resolved. The author points out political and economic factors that have helped alter the European picture since World War II and "eliminate traditional boundaries."

D. OUTER SPACE

1556
THE CASE FOR A UNITED KINGDOM SPACE PROGRAM. Spaceflight, v. 8, Oct. 1966: 347-354, 376.
TL787.B725, v. 8

The National Industrial Space Committee has reviewed aspects of space technology and their importance to Great Britain. Committee recommendations are intended to improve the unsatisfactory situation of British space policy and techniques. A national program would ensure that Britain plays a part in international collaborative projects; that it maintains competence in military projects related to national defense policy; that it remains in the forefront of technological progress; and that it applies knowledge gained from participating in international programs and those of other nations.

1557
Eisendrath, Craig. THE OUTER SPACE TREATY. Foreign Service journal, v. 44, May 1967: 27, 44.
JX1.A53, v. 44

The treaty banning nuclear weapons in outer space is the product of almost 10 years of diplomatic effort. It is one aspect of a comprehensive U.S. program for space cooperation, which involves tracking, communications, meteorology, and scientific research. One of America's first steps toward this goal was the separation of its peaceful and military space programs through creation of the National Aeronautics and Space Administration, a move that facilitated international space programs. The U.N. Committee on the Peaceful Uses of Outer Space is also an American initiative. The space treaty incorporates many earlier U.N. resolutions but it, unlike the resolutions, is legally as well as morally binding. Its three most important provisions ban military bases, weapons testing, and military maneuvers on celestial bodies or the orbiting or stationing of weapons of mass destruction in outer space, and give signatories the right to visit each others' facilities in space. It fails to settle the important issue of the legality of military observation from outer space. The treaty is open to signature by all states. The United States preferred to ban unrecognized states, but "the need for international agreements could not wait on the niceties of diplomatic recognition, and, in any case, [the U.S.] China policy has been softening." While the treaty's contributions to arms control are limited, its significance for future cooperation could be vast.

1558
OUTER SPACE TREATY. In Canada. Department of External Affairs. External affairs, v. 19, Mar. 1967: 86-87. JX351.A3, v. 19

An enumeration of the provisions of the outer space treaty, signed on January 27, 1967. The author states that the treaty is the most significant development in arms control since the Nuclear Test Ban Treaty of 1963.

1559
Rehm, Georg W. [POLITICAL-MILITARY SIGNIFICANCE OF THE SPACE TREATY OF JANUARY 27, 1967] Die politisch-militärische Bedeutung des Weltraum-Vertrages vom 27. Januar 1967. Europa-Archiv, v. 22, Apr. 25, 1967: 287-296. D839.E86, v. 22

The "Treaty on Principles Governing the Activities of States in Exploration and Use of Outer Space, Including the Moon and Other Celestial Bodies" repeats the October 17, 1963, U.N. resolution, which renounced stationing nuclear weapons in space. By lending a contractual form to that renunciation its signatories, principally the United States and the Soviet Union, have underscored its importance. However the treaty does not provide for sanctions, which indicates the agreement's primarily political purpose: to build mutual East-West confidence for successful arms control and disarmament negotiations. As for the space treaty itself, it shows a convergence of Soviet and American interests in matters that are militarily inconsequential (impractical) for both parties, and an ambiguity in practical questions, such as the difference between the peaceful and nonpeaceful use of observation and navigation satellites.

1560
Turkevich, J. THE SOVIET SPACE EFFORT. Current history, v. 51, Oct. 1966: 226-232. D410.C82, v. 51

Recounts the history of the Soviet space effort. The three areas studied are the work accomplished prior to World War II in Imperial Russia and the Soviet Union; the German scientific accomplishment during the Second World War; and the work carried on after the war in the Soviet Union. Turkevich believes that the launching of Sputnik I ushered in the space age and confirmed the military importance of space flight--the use of rockets for weapons propulsion and space platforms for launching bombs.

1561
Vlasic, Ivan A. THE SPACE TREATY: A PRELIMINARY EVALUATION. California law review, v. 55, May 1967: 507-519. LL

Reviews the background of the treaty banning nuclear weapons in outer space and briefly describes its major provisions. Vlasic criticizes the treaty for embodying only general principles and leaving unsettled a number of issues on which legal regulation is urgently needed. For example, the provisions concerning free access to celestial bodies are too general to solve problems such as whether participants must share favorable landing spots if a scarcity of suitable sites exists and how resources found on celestial bodies should be allocated. Although generally lauded as a step toward limiting the arms race, the treaty contains no provision to curb the arms race in the "void" of outer space other than the clause prohibiting placement of weapons of mass destruction in orbit.

E. VIOLATION OF AGREEMENTS AND RESPONSES

1. Violation, Inspection, Verification

1562
ALL QUIET AT VIENNA, by Our special correspondent. Nature (London) v. 214, June 24, 1967: 1292-1294. Q1.N2, v. 214

Reports the early June meeting of the Board of Governors of the International Atomic Energy Agency, which was marred only by Arab protests over the supply of a French reactor loop to Israel. In the reporter's view this would ordinarily have been a routine item, but in light of the recent war it provoked "acrimonious debate." The meeting also pointed up the steady and sure extension of the Agency's safeguards system, although, of course, the real focus for discussion of safeguards is the 18-Nation Disarmament Conference at Geneva. Commercial secrecy, which has been a bugaboo of the inspection discussions at Geneva, is apparently not eliminated under the Agency's safeguards, for installations can deny access to individual inspectors of whom they disapprove or have members of their own staffs accompany inspectors on their rounds. The Agency has shown the greatest progress in the fields of technical assistance and exchange of nuclear information. It seems to Nature's correspondent that the Agency cannot grow without a little dissension and that "a quiet life is not necessarily the goal at which to aim."

1563
Berman, Harold J., and Peter B. Maggs. DISARMAMENT INSPECTION UNDER SOVIET LAW. Dobbs Ferry, N.Y., Oceana Publications, 1967. 154 p. JX1974.B43
Bibliography: p. 147-150

Examines the aspects of Soviet law potentially relevant to inspection, the privileges and immunities of the inspectorate, and the legal problems connected with such inspection functions as examining state property and documents and interrogating Soviet officials and private citizens. Berman finds that, like the American system, Soviet law presents legal and political obstacles to on-site or aerial disarmament inspection. On the other hand, Soviet law is sufficiently stable and flexible to overcome many of these obstacles. Changes in Soviet legislation designed to permit the work of international inspectors could also create political pressures toward submitting to inspection arrangements. But international inspectors will never penetrate certain areas of Soviet political and economic life no matter what changes are made in the Soviet legal system. As documentation, Berman includes substantial translated excerpts from Soviet law.

1564
Capon, J., R. J. Greenfield, and R. J. Kolker. MULTI-DIMENSIONAL MAXIMUM-LIKELIHOOD PROCESSING OF A LARGE APERTURE SEISMIC ARRAY. In Institute of Electrical and Electronics Engineers. Proceedings, v. 55, Feb. 1967: 192-211. TK5700.I6, v. 55

Describes the "Large Aperture Seismic Array," which attempts to improve the capability to monitor underground nuclear weapons tests and small earthquakes by "making a large extrapolation in the existing art of building arrays of spaced and interconnected seismic transducers."

1565
Carroll, Kent J. A SECOND STEP TOWARD ARMS CONTROL. In U.S. Command and General Staff College, Fort Leavenworth. Military review, v. 47, May 1967: 77-84. Z6723.U35, v. 47

With agreement by the Soviet Union and the United States on such first steps toward arms control as the limited test ban treaty, the treaty to ban mass-destructive weapons in outer space, and cooperation in reducing production of fissionable materials for arms use, it is time to implement an inspection and verification system to prevent surprise attack and proliferation of nuclear weapons. Since degrees of damage acceptability in the event of retaliation against nuclear attack cannot be precisely predicted, national defense precautions must be supplemented by an inspection system of strategic-weapons sites to provide stronger protection against surprise attack. As the Soviet Union would most likely object to an on-site inspection network of land-based missiles, the initial stage of a broad inspection and verification system could concentrate on surveillance of the strongest strategic threat, the missile submarines of the United States and the Soviet Union. Boundaries restricting movement of ships within range of the target area would be determined by the range of the missile load, speed of the submarine, and length of intervals between coded reports from the verification team situated aboard. Additionally, inspection teams would be posted at missile-submarine bases, drawing on the staff of the military attaché as a nucleus, with the teams employing Soviet nationals on United States property (and vice versa) as well as neutral personnel. Once the organizational and technical details of such a model were operational, it could be broadened to include controls on nonproliferation agreements and all existing nuclear weapons systems.

1566
Gorove, Stephen. INSPECTION AND CONTROL IN EURATOM. Bulletin of the atomic scientists, v. 23, Mar. 1967: 41-46. TK9145.A84, v. 23

The European Atomic Energy Community [Euratom] was the first international body to operate a multilateral nuclear inspection and safety-control system. In contrast with the control systems of the International Atomic Energy Agency and the European Nuclear Energy Agency, which attempt to prevent diversion of nuclear materials from peaceful to military uses, Euratom permits both peaceful and military uses of nuclear materials provided the materials are used in conformance with the user's declared intention. To verify the use and supply of nuclear materials and perform its other functions, Euratom requires knowledge of the nature, amount, location, and use of all members' materials, and of movements, transfers, and alteration of these materials. It must verify both the accuracy of the information submitted to it and compliance with control provisions. Much verification work is done at Euratom headquarters in Brussels--accounting and statistical analyses and checks, and physical counting, measuring, weighing, and sampling of materials--but the heart of the control system is the on-site inspection. The Euratom treaty does not limit the number, length, or place of on-site inspections in any way, but inspectors have attempted to strike a balance between "maximum possibilities and minimum requirement" in order not to impair industrial efficiency, violate organizations' privacy, or otherwise antagonize those inspected. Two types of violations of the control system can occur: opposition to inspection and all other violations. In the former the Commission appeals to the Court of Justice to issue a warrant to enforce execution of the inspection, but ultimate responsibility for conformity rests with the national authorities, who must assure access to the inspectors. In other infringements the Commission can order the member to desist and, when that fails, refer the measure to the Court of Justice. Here again ultimate enforcement of the Court's decision rests with national authorities, but the Commission can impose such sanctions on violator enterprises as withdrawal of financial or technical assistance and partial or total withdrawal of materials. While the significance of Euratom's accomplishments should not be belittled, the difficulty and reluctance it has encountered in subjecting military establishments to inspection and control must be recognized. Furthermore, the lack of violations to date may well stem from the fact that Euratom places no restrictions on the uses of the atom aside from conformity with the user's declared intentions, rather than from the efficiency of the inspection system.

1567
Hill, D.P., and L.C. Pakiser. SEISMIC-REFRACTION STUDY OF CRUSTAL STRUCTURE BETWEEN THE NEVADA TEST SITE AND BOISE, IDAHO. In Geological Society of America. Bulletin, v. 78, June 1967: 685-704. QE1.G2, v. 78

Interprets data obtained by the U.S. Geological Survey in the summer of 1962 from a "series of reversed seismic-refraction profiles" established at five points along a 454-km. line between Eureka, Nevada, and Boise, Idaho, and from recordings of the seismic waves generated by underground nuclear explosions at the Nevada test site.

1568
Howell, B. F., and others. METHOD FOR RECOGNIZING REPEATED PULSE SEQUENCES IN A SEISMOGRAM. Journal of geophysical research, v. 72, June 15, 1967: 3225-3232.
QC811.J6, v. 72

A seismogram may be treated as the sum of a primary wave train, a secondary wave train, and noise. Assuming the secondary has the same wave form as the primary and arrives at time Δt behind it with a relative strength R, a deconvolved seismogram which is an estimate of the primary seismogram can be found for every Δt. It is postulated that at Δt's close to the values of real secondaries, especially pP, the deconvolved seismogram will be simplified. A test based on the decrease in energy represented by the deconvolved seismogram is proposed with empirical justification by which such times can be determined. This method of recognizing secondaries is tested on 14 seismograms of the May 10, 1963, Ecuador earthquake and on 14 nuclear-blast seismograms. Although it picks out secondaries, it finds many other pulses besides pP; however, it does not always find pP. (Authors' abstract)

1569
Lindgren, N. EARTHQUAKE OR EXPLOSION? THE SCIENCE OF NUCLEAR TEST DETECTION. In Institute of Electrical and Electronics Engineers. Spectrum, v. 3, Aug. 1966: 66-75.
TK1.I15, v. 3

Outlines the problems of underground detection and identification, offers some background in geophysics that enables the nonspecialist to understand the niceties of the engineering problems involved, and cites some of the criteria for discriminating underground events. It concludes with an examination of the Large Aperture Seismic Array [LASA] and the possible political effects of recent scientific and technical developments.

1570
Paynter, D. A. A FIELD DETECTOR STATION FOR THE DASA FALLOUT AND TRANSIT DOSE RATE MEASUREMENT SYSTEM. Edgewood Arsenal, Md., Nuclear Defense Laboratory, 1966: 44 p. (Nuclear Defense Laboratory. Technical report NDLTR-71 (suppl.))
AD 636206.
L.C. copy on microfiche.
Sci RR

Describes a solid-state version of the detector station electronics used in the Defense Atomic Support Agency [DASA] Fallout and Transit Dose Rate Measurement System. The solid-state version has proven to be superior to the experimental vacuum tube model, "and it reflects both cost and electrical economies."

1571
SAFEGUARDS PROGRAM. Washington atomic energy report and the atomic energy guideletter, v. 13, May 15, 1967: 1-2. HD9698.U5W3, v. 13

Between June 26 and 27 at the Argonne National Laboratory the Atomic Energy Commission [AEC] will conduct a symposium on safeguards to prevent diversion of civilian nuclear materials to military uses. A special panel has drawn up 13 recommendations for the symposium to discuss, including provisions for criminal penalties for unauthorized diversions, a high-level AEC body and an interagency committee to oversee the safeguards program, and AEC review of facilities, licensees, and certain nuclear materials. The panel further recommends that the United States work toward the establishment of an effective universal safeguards system under the International Atomic Energy Agency and increase its research and development efforts on safeguards techniques.

1572
Willrich, Mason. INTERNATIONAL CONTROL OF CIVIL NUCLEAR POWER. Bulletin of the atomic scientists, v. 23, Mar. 1967: 31-38.
TK9145.A84, v. 23

Nuclear reactors can make a significant contribution to the international environment if the plutonium produced as a by-product of their operations can be controlled. The supplier of nuclear materials and equipment is clearly able to require safeguards as a condition of the sale, but considering the complexity of international transactions, cooperation among exporting nations is necessary for effective implementation of safeguards. The Soviet Union has not yet required the facilities that it has supplied to be placed under international safeguards, but since 1963 it has supported the development of effective International Atomic Energy Agency [IAEA] inspection procedures. Since the Soviets to date have shown little inclination to supply nations outside the bloc, the possibilities of control over non-Communist civilian nuclear facilities remains open. Furthermore it is possible that some bloc nations will prefer IAEA safeguards over Soviet bilateral arrangements. France has refused thus far to impose any international safeguards requirements on its sales; the seriousness of this attitude will depend on the share of the reactor market that the French acquire. Once an inspection system is agreed upon many technical and political problems will arise. For example, as only a few undetected kilograms of the vast amounts of plutonium produced yearly are sufficient for weapons development, severe strains will be placed on the control system. Such small amounts are nearly impossible to detect, and secret stockpiles can provide a nation with important lead time in research and development. The application of sanctions when a violation is detected is also a problem. Action by an international body such as the United Nations or the IAEA or cutting the foreign fuel supply are two possible approaches. Prompt and widespread recycling of fuel can also ameliorate the control problem.

2. Enforcement

1573
Carnegie Endowment for International Peace. PEACEFUL USES OF ATOMIC ENERGY. In its Issues before the 21st General Assembly. New York, 1966. (International conciliation. Sept. 1966, no. 559) p. 41-43. JX1907.A8, no. 559

Although the International Atomic Energy Agency's technical assistance program has run into financial difficulties, the Agency has taken positive steps to control the peaceful uses of nuclear energy. It has undertaken to revise its safeguards system: it reviews the design of principal nuclear facilities under its control and inspects nuclear facilities to verify a state's compliance with safeguards principles and agreements.

The state in question arranges to maintain accounting records of all safeguarded material and operating records for its major facilities. This inspection and control system has been written into the draft treaty for the denuclearization of Latin America. This system now covers a total of 55 reactors in 24 countries.

1574
Gérard, Francis. [THE NUCLEAR NONPROLIFERATION TREATY] Le traité de non-dissemination des armes nucléaires. L'Europe, v. 86, May 1967: 2-5.
P&GP RR

Proposes a plan whereby the nuclear nonproliferation treaty would give the International Atomic Energy Agency [IAEA] power to enforce the inspection safeguards by exercising "internal control" over civilian reactors. IAEA would designate technicians and researchers to work in installations to inform the agency about violations and new developments and experiments. Without an effective inspection system the nonproliferation treaty would be meaningless.

F. CONSEQUENCES OF ARMS CONTROL AND DISARMAMENT MEASURES

1575
Bácskai, Tamás. THE ARMAMENT RACE AND THE DEVELOPING COUNTRIES. In International Institute for Peace. Active coexistence, no. 12, Apr./June 1967: 1-8. P&GP RR

The scarcity of capital in underdeveloped nations acts as a brake on their economic development. Hence it is appalling to discover that in 1961 the arms expenditures of these states constituted a deduction of $13 billion from the wealth created by their populations, wealth that could have been used to advance their economies. In weapons procurement alone they are spending $1 billion yearly, an amount that they could divert to other uses if they agreed to freeze current armaments levels. However it is doubtful that developing countries will agree to disarm when the rest of the world is armed, even with guarantees by the Great Powers. General disarmament seems to be the only way to ease the economic burden of the arms race. At the initial stage of a general disarmament, capital formation in developing nations would amount to $16-$17 billion of their $50 billion annual capital requirement. Large increases in foreign aid to these countries would be necessary to make up the deficit, and the diversion of world defense expenditures is the only possible means of raising an amount this size. Such sums invested over the next 10 to 15 years would permit the underdeveloped nations to approach the current level of industrial output of the developed nations and would work toward the ultimate betterment of the industrialized nations of the world as well by increasing their production and employment.

1576
Conference on Economic Aspects of World Disarmament and Interdependence, Oslo, 1965. DISARMAMENT AND WORLD ECONOMIC INTERDEPENDENCE. Emile Benoit, editor, with the assistance of Nils Petter Gleditsch. Oslo, Bergen [etc.] Universitetforlaget, 1967. 260 p. (Peace research monographs, no. 1)
Scandinavian university books.
"Organized by RIEDAC--Research on International Economics of Disarmament and Arms Control--in cooperation with the International Peace Research Institute, Oslo."
Includes bibliographies.
HC65. C6, 1965aa

Partial contents. --The world burden of national defense, by Emile Benoit and Harold Lubell. --Economic factors in Soviet attitudes towards arms control, by Morris Bornstein. --Arms control and the vulnerability of Communist China's economy to external pressures and inducements, by Alexander Eckstein. --The transfer of defense industry capabilities to the solution of domestic problems, by Arthur Barber. --The economics of regional arms races, by J. Hoagland and J. Teeple. --The economic consequences of disarmament in Norway, by Olav Bjerkholt. --Disarmament and its economic consequences for the atomic and aerospace industries, by Francois Perroux. --Some effects of disarmament on research and development, by Ludek Urban. --Public opinion on the economic effects of disarmament, by Johan Galtung. --East-West trade in the arms control context, by Alec Nove.

Papers prepared for the Conference on Economic Aspects of World Disarmament and Interdependence, held in Oslo, Aug. 29-Sept. 1, 1965. The papers are directed toward the study of international conditions favorable to disarmament and how the international economic environment can benefit most from the feedback from this process.

1577
Galbraith, John Kenneth. THE COLD WAR AND THE CORPORATIONS. Progressive, v. 31, July 1967: 14-18.
AP2. P8655, v. 31

The U.S. industrial system in its use of "fantasy and image-building" is similar to advertising. Industry strives to maintain an image of this country as one threatened by a dangerous lag in technology in order to promote additional research and development; and when the threat is seen as coming from an international enemy, the research is directed specifically toward weapons research and development. However, industry's image-building activities are less obvious than advertising claims, and less subject to public questioning. The U.S. industrial system relies heavily on the public sector of the economy for the stabilization of aggregate demand. For 20 years the cold war has provided the image for rationalization of large military expenditures. The cold war is not solely the product of the industrial system, of course, but their relationship has been remarkably close. The cold war image of the world implies that the U.S. and Soviet economic systems are incompatible, and that military competition and a strong deterrent are essential to the "ultimate triumph of liberty." Since in the cold war the Communist threat is viewed as implacable, temporary easing of tensions does not lead to reduction in military expenditures. Previous conflicts have allowed decreases in military expenditures when the fighting stopped, but technological competition is never resolved. "War without fighting neatly obviates the danger that fighting will stop." Under such favorable circumstances weapons competition has won increasing acceptance, and to the public has become "normal, natural, and inevitable." In reality the United States and the Soviet Union can both achieve economic success. Convergence of economic goals and methods, rather than conflict, is the most likely tendency. The notion that arms competition is benign is dangerously fallacious, for the chance of war through accident or miscalculation is all too likely. The risks of agreed disarmament are far less than those of continuing weapons

competition. The public must be aware of image-building in public policy and employ the same skepticism there that it uses in other areas. Reducing weapons competition without insuperable economic difficulty will involve considerable government planning. It will require increased public outlays, tax cuts to bolster demand, and retraining, reeducation, and relocation for affected workers. Where military spending has provided the impetus for technological innovation, new incentives must be found.

G. OTHER PROBLEMS AND MEASURES

1578
Borch, Herbert von. [THE SPLENDOR AND MISERY OF CRISIS MANAGEMENT] Glanz und Elend des Crisis Management. Aussenpolitik, v. 18, May 1967: 268-278. D839. A885, v. 18

Outlines the development of the American crisis-management doctrine and practice over the recent years.

1579
Buckley, Michael. FRENCH OPINION ON AN 'AMERICAN' WAR. America, v. 116, June 3, 1967: 810-811. BX801. A5, v. 116

The belief that the French are all hostile toward America's policy in Vietnam does not correspond to opinion polls taken in France. Although the average Frenchman is continually exposed to anti-American propaganda concerning Vietnam he is "skeptical, but not hostile, in judging U.S. policy in this war." Within the parties opposed to the war dissension is rampant, and agreement can be reached on nothing more than grandiloquent phrases calling for an end to the war. Far Left committees that aid North Vietnam (such as the Committee of a Million for Vietnam) cannot agree on what to do with the money they receive--whether to spend it on ammunition or medicine. French Catholics condemn the war and bitterly criticize "sermonizing" in favor of the values and morals of the war. Consequently the war has become a whipping boy for Catholics and Communists alike. However the majority of French Catholics oppose the war in Vietnam because they fear the revival of a union between clericalism and laissez-faire capitalism and colonialism, not because they are anti-American.

1580
Menges, Constantine C. MILITARY ASPECTS OF INTERNATIONAL RELATIONS IN THE DEVELOPING AREAS. Santa Monica, Rand Corp., 1966. 96 p. (Rand Corporation. Paper P-3480) AS36. R28, no. 3480

Isolates a single factor in the relationship among states--military power--and observes its effects in six regional situations: the Near East, South Asia, Southeast Asia, North Africa, Sub-Sahara Africa, and Latin America. Menges analyzes the manner in which problems in these regions differ from those within the European state system, and concludes with a discussion of arms control in developing areas, noting the special problems and characteristics involved and the arms control measures most relevant to them. Menges warns that the danger inherent in further development of military technology in the larger developing states and the expansion of their present capability make it imperative that all nations make a greater effort to achieve regional arms control in some form. The study includes a number of charts and tables, showing the nuclear potential of developing areas by region and the commercial arms trade, sources of military assistance, and armed forces budgets of the developing nations.

1581
Pay, Rex. ABM WOULD IMPERIL TEST BAN TREATY. Technology week, v. 20, Mar. 20, 1967: 14-15. UG630. M54, v. 20

Atmospheric testing of an antiballistic missile [ABM] would threaten the validity of the nuclear test ban treaty. Since underground nuclear detonations and testing with conventional warheads have proven insufficient to determine the ABM's true behavior at low and high altitudes, test explosions should be performed to determine variant altitude effects on soft x-rays and weapon debris, the factors that constitute the kill mechanisms within the ABM detonation system. At high altitudes x-rays have a long-range heat span capable of vaporizing and crumbling enemy missiles, while in lower altitudes their range is shorter--as low as 1 foot at sea level. Weapon debris that expands rapidly in the upper stratosphere tends to expand more slowly at lower altitudes. In order for ABM designers to know how the system will react at specific altitudes nuclear tests will have to be carried out despite their burden on the treaty.

1582
Skidmore, I. C. THE PHYSICS OF DETONATION. Science progress, v. 55, summer 1967: 239-257. P&GP RR

The hydrodynamic theory of detonation provides a physical description of the detonation process without reference to the details of the chemical processes involved. This account describes the development of the physical approach with a particular emphasis on the advances made in the understanding of solid explosive behaviour since the Second World War. Equations of state of detonation products derived by fitting data from modern explosive experimentation are reviewed; situations where non-steady detonations occur are discussed; and finally, problem areas for further elucidation are indicated. (Abstract supplied)

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